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MANAGEMENT AUDIT
of the

DEPARTMENT OF AIRPORTS

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by

Robert E. Chase
Acting City Administrative Officer

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CITY OF LOS ANGELES

CALIFORNIA

C. ERWIN PIPER
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ASST. CITY ADMINISTRATIVE OFFICERS

TOM BRADLEY
MAYOR

November 14, 1979

The Honorable Council of the
City of Los Angeles

The Honorable Tom Bradley
Mayor of the City of Los Angeles

Board of Airport Commissioners

Transmitted herewith is the Report on the Management Audit of the Department of Airports. The audit was initiated in the normal course of events in furtherance of City Charter Section 53 for the purposes of examining operational compliance and evaluating the efficiency and effectiveness of the Department.

Although the audit was started in January 1978, major work on the project did not begin until late February. Delays were encountered during the audit - both in terms of time required for legal interpretations and audit team personnel continuity - resulting in an extended elapsed time for the effort. The statistical and financial data used were the latest figures available at the time the report was drafted. The figures have been updated only in those instances where more current data has a direct bearing on the findings and recommendations.

The recommendations contained in the Report have been divided into three categories to facilitate consideration as follows:

1. "For Mayor and Council attention."
2. "For Mayor, Council and Department attention."
3. "For Mayor and Department attention."

The Board of Airport Commissioners is requested to submit a report in six months to the City Administrative Officer detailing

The Honorable Council of the
City of Los Angeles

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The Honorable Tom Bradley
Mayor of the City of Los Angeles

Board of Airport Commissioners

the progress achieved in implementing the recommendations of the audit. My Office will then prepare an evaluation of the progress with appropriate recommendations, and transmit it with the Department's progress report to the Mayor and Council for information and necessary action.

The Management Audit of the Department of Airports was directed under my supervision by John R. Coombs, Assistant City Administrative Officer, and Al M. Beuerlein, Chief Administrative Analyst. Members of the Audit Team were: Robert J. Arata, C. Edward Corser, Donald W. Ketcham, Raymond P. Summer, and Leonard D. Tupper. My staff will be available to assist with audit follow-up as may be required.

Robert E. Chase
Robert E. Chase
Acting City Administrative Officer

REC:AMB:mas

cc: Each Member of the City Council
General Manager, Department of Airports

II. SUMMARY OF FINDINGS

The overall finding of this audit is that the management of the Department of Airports is effectively fulfilling its basic responsibilities in an extremely dynamic and sensitive environment. The efforts of the Department have been directed, as a matter of topmost priority, to fulfilling the language of the City Charter which specifically relates the authority, powers, duties and resources of the Department to "the promotion or the accommodation of air commerce and air navigation".

It is unmistakably clear that the City of Los Angeles, through the Department of Airports, is operating regional facilities serving a large regional public comprising a five-county highly populous area. It is apparent that as a result of this regional character of operation the City of Los Angeles assumes ultimate responsibility and liability for a multi-million dollar enterprise which receives more utilization from non-residents than from residents. We have found the present capacity of the Los Angeles International Airport (LAX) to be sorely overstressed, and at peak times actually incapable of accommodating the demands placed by an unprecedented growth in air passenger travel. The capacity constraint is not due to the inability to accommodate flight operations, but rather to problems of ground access to the Central Terminal Area (CTA).

City efforts to stimulate interest in a regional airport planning and operational entity should be accelerated and expanded immediately. Furthermore, new alternatives for "short haul" transportation should be explored by the appropriate State and/or regional planning agencies. Expansion of facilities at Ontario International Airport (ONT) should be expedited significantly to provide as much relief as possible to LAX. Development of the proposed Palmdale International Airport by a regional airport authority rather than the City of Los Angeles is advocated in view of the regional significance of the planned site.

The City Council has set 40 million annual passengers as an upper growth limit for LAX forecast to be reached in 1990. At the present rate of increase it will be attained in 1981. Airport development has not, and could not realistically be expected to have kept pace with such growth. Under the circumstances, the policy for future growth at LAX must be reevaluated immediately. It may be necessary to impose limits on passenger increases at LAX if ground traffic congestion cannot be relieved sufficiently.

After a ten year period of no significant capital development, the Department has now launched a massive \$535 million physical expansion program for LAX and Ontario airports. A second-level roadway and two new terminals will be constructed

at LAX over the next five years. It is anticipated that these developments will enable passenger volumes to reach the level of 40 million annual passengers at LAX without a corresponding increase in congestion.

One of the most significant challenges to Department management is the matter of planning for airport development. The task has become increasingly difficult given the competing interests of airlines, traveling public and resident public. Planning objectives should be consolidated, updated and maintained on a regular basis. They should also be reconciled with policy statements on regional transportation and airport development prepared under the sponsorship of the Southern California Association of Governments (SCAG).

State noise standards established for airports in 1971 require a progressive reduction in noise levels through January, 1986. LAX generates noise at a level which is not in compliance with the standards, and the Department must annually request a variance from the State of California. The Department has not developed a specific plan to meet the 1986 State requirements. The Environmental Impact Report (EIR) for LAX lists a series of noise control recommendations which should be specifically evaluated by Department management.

The Department has in its possession significant LAX property holdings (approximately one square mile in total area) which are maintained as unproductive "clear zones". These areas appear to have large-scale income producing potential as light industrial and commercial leaseholds. Recently, the Department has begun to explore the potential, but the effort needs to be aggressively pursued, a specific action plan formulated and a timetable for accomplishment developed. Because of the vital concerns involving Airport and Westchester Community planning and zoning and traffic flow considerations, it is imperative that the Department work closely with the City departments of Planning and Transportation, respectively.

The LAX element of the City's General Plan should be updated in the light of developments planned and other important factors which have changed since the element was initially prepared. The environmental impact of the various traffic congestion considerations which relate to the future development of the airport should be the subject of a specific study effort as well.

The Department's financial position is very sound. It is a tribute to management which has operated without benefit of formal financial planning. Some of the problems which the Department is now experiencing could have been more clearly foreseen if steps had been taken to implement planning policy and

procedures, and if there had been more decentralization and delegation of financial planning efforts now performed by top management. There is a definite need for formal planning in this activity. Furthermore, the Department's cost accounting capability is in need of modification to eliminate existing complexities and to provide improved management information and reporting, particularly with respect to determining the profitability of major facilities, leaseholds and other revenue producing sources.

A financial relationship has developed between the Department and its airline tenants in furtherance of the general objective to promote and accommodate air commerce and air navigation; a relationship which in the past has been beneficial to the City and its people. Operating agreements which have formed the basis of the relationship for the past 32 years should now be renegotiated. The general objective should be to improve the interests of the City while acknowledging that major changes have taken place (including environmental legislation, airline deregulation, unforeseen rate of passenger volume growth, ground access congestion, and others). We have made specific proposals for modifications to the existing operating agreements.

Heavy vehicular traffic in the Central Terminal Area during peak travel hours creates intolerable congestion and disruption of schedules and access throughout the LAX area. The Department is attempting to implement a variety of short-term alternatives to improve traffic flow, but greater effort is required to maintain even the status quo in the face of unprecedented growth.

Parking operations generate the largest amount of non-airfield revenue for the Department (over \$18 million in 1978-79). The Audit Team observed a number of problems with the current parking operations which should be addressed directly by the Department. The improvements recommended in this report will permit the Department to recover a large part of a significant annual gross revenue loss. A key recommendation calls for the creation of a full-time position to guide and coordinate the Department's parking operations.

There is an apparent need for Department management to direct its attention to the structure, staffing and responsibilities of the Operations Section. The Audit Team noted a definite feeling among Section employees that management does not understand their work and its importance, and generally lacks concern for the assigned employees. Relationships between Operations Section and the Maintenance and Security Divisions, Police Department, U.S. Coast Guard, etc., need to be specifically defined and responsibilities for various situations clearly spelled out. Updating of the LAX Operations Manual and

Security Program is required to reflect changes which have taken place in the Operations Section.

Airport security personnel are faced with unique potential for a wide variety of crimes against persons as well as property. This report advocates restructuring the Security function at LAX as a means of increasing overall efficiency and clarifying relationships among security forces. The Department should explore the feasibility of LAPD assuming total responsibility for Airport security and the Department of Transportation assuming responsibility for traffic and parking control at LAX.

Maintenance requirements are increasing at Ontario International Airport, and there is reason to question the accuracy of current staffing levels. Inspections by craft supervisors occur on an unscheduled and informal basis, and proper documentation is lacking. Serious consideration should be given to implementing a formal, systematic inspection and work control program for maintenance at Ontario Airport especially, but also at LAX and Van Nuys.

As an alternative to the use of decentralized "craft storerooms" to maintain working inventories of parts and materials necessary for the repair of airport building, equipment and utility systems, the Department is considering the construction of a new central warehouse in the maintenance yard at LAX. The feasibility of such a plan should be tested carefully using cost-benefit analysis as the basis for the determination. Existing materials management procedures have not been fully responsive to the needs of the Maintenance Division. In addition, there is a need to review the present method of apportioning materials costs for maintenance work to specific account numbers.

The official management structure of the Department does not portray the actual organization as it operated at the time of audit. Three high-level management positions are proposed for elimination, and one new administrative position is suggested. A new grouping of existing administrative staff positions is proposed to consolidate similar activities, balance workload and relieve the First Deputy General Manager of an excessive span of control.

Airport tenant construction projects require excessive processing time under current procedures. Department management should initiate steps to expedite the project approval process.

Records management is recognized by top level Department staff as an administrative problem area requiring solution. A comprehensive approach is indicated to meet a variety of needs

that go beyond compliance with Administrative Code requirements for records retention. In this instance, retaining the services of a qualified consultant is recommended.

III. RECOMMENDATIONS

For Mayor and Council Attention

It is recommended that the Mayor and Council:

1. Adopt a City policy position endorsing the critical need for a full-scale effort by all governmental and quasi-governmental agencies with air transportation operational and/or planning responsibilities to establish at the earliest time a regional airport planning and operational entity.
2. Adopt a policy position that the City strongly supports the need for alternative transportation modes for "short haul" travel and encourage the various State and regional planning and related agencies to develop such alternatives on a priority basis.

For Mayor, Council and Department Attention

It is recommended that the Mayor, Council and Board of Airport Commissioners:

3. Establish a policy to develop regional assistance for the future financing of major airport improvements at Palmdale. The City of Los Angeles should hold the acquired property available for airport development by a regional authority.

For Mayor and Department Attention

It is recommended that the Board of Airport Commissioners instruct the General Manager to:

4. Establish an accelerated timetable for the development of Ontario International Airport to include:
 - a. Begin design as soon as possible for Phase I of the terminal expansion program.
 - b. Assign staff immediately to assess the requirements for ground access, parking and possible land acquisition consistent with an overall development plan. The ground access requirements should be communicated directly to the appropriate State and local agencies responsible for implementing access modifications.
5. Reevaluate the policy for future growth at LAX and prepare a plan which indicates required improvements and the Department's commitment to deal with present and future

vehicular congestion. Analyze methods whereby limits may be imposed on passenger increases at LAX in the event short-term improvements are insufficient to cope with present and future levels of ground traffic congestion.

6. Review Department objectives for the further development of airport facilities in light of accelerated passenger demand, airline deregulation, access and noise problems and policy statements on regional airport planning made by the Southern California Association of Governments (SCAG). Update and consolidate Department development objectives and policy resolutions and use them as a guide in evaluating future management operating decisions and specific capital projects and their priority.
7. Pursuant to State noise standards, and in cooperation with communities surrounding LAX, prepare a plan for the conversion of land uses incompatible with airport operations by 1986.
8. Prepare a report to the Board of Airport Commissioners indicating the management response to noise control recommendations in the LAX Environmental Impact Report.
9. Present within 120 days a specific plan of action, cost/benefit analysis, and a timetable for completion of necessary steps required to prepare for development the presently unproductive LAX property in the Playa del Rey and North acquisition areas, and the West Maintenance Area.
10. Work with the Transportation and Planning Departments to develop a consensus on the public improvements required to compliment the development of the clear zone areas, and the responsibilities of each department involved.
11. Organize, staff, and assign responsibility for a formal financial planning program. The first order of business should be to prepare and submit to the Board for approval a statement of financial planning goals, consistent with the Department's long-range planning philosophy and objectives, which would resolve such issues as:
 - a. The extent to which each airport and facility is to be self-supporting.
 - b. The extent to which capital funds are to be generated internally from operations as opposed to being generated externally from bond sales or grants; the extent to which the landing fee minimum should be increased to achieve this objective.

- c. The extent to which the Department should restructure landing fees by imposing peak hour surcharges to discourage peak hour landings and encourage redistribution of aircraft landings thereby minimizing peak hour activity.
- d. The extent to which the Department and each airport or facility should maximize revenues, particularly non-airfield revenues.
- e. The extent to which the Department of Airports should contribute to or reimburse the City for off-site capital, operational, and maintenance costs which are required in the areas impacted by the airport growth and activity, including such costs as street development, street maintenance, traffic control, sewers, street lighting, etc.
- f. The extent to which the Department should reimburse the City for direct and indirect costs of services provided by other City departments.

12. Enter into negotiations with the airlines for the purpose of amending the existing operating agreements:

- a. To provide for an increase in the existing landing fee minimum of 16¢ per 1000 lbs. of certificated gross landing weight to a level more consistent with the Department's current revenue and cost structure.
- b. To provide for periodic revisions of the minimum landing fee rate, perhaps every three years.

13. Establish a committee comprised of accounting, data processing, and appropriate line management personnel for the purpose of developing a new chart of accounts which would:

- a. Eliminate existing complexities and ambiguities;
- b. Provide a basis for all necessary management information and annual financial reports, including internal management reports showing the profitability of each major facility, and, to the extent feasible, for each lease or revenue producing source therein;
- c. Accommodate the future growth of the Department of Airports or possible evolution of the Department into a regional airport authority.

14. Continue and expedite planning efforts now in progress to implement short-term alternatives aimed at reducing vehicular

traffic congestion within the Central Terminal Area and on surface streets leading to LAX.

15. Appoint a full-time Department Parking Coordinator responsible for planning and implementing parking system improvements, auditing compliance to the operating agreement by the Parking Operator, acting for the Department in parking matters, and administering assignments and control of all Department and airline employee parking.
16. In one Central Terminal Area parking lot, conduct a test of a parking system designed to eliminate the estimated 120,000 lost parking tickets annually, and require;
 - a. auto parking tickets to be visibly displayed on the inside of the automobile.
 - b. a maximum daily lot charge for any lost ticket not on the long term parking inventory sheet, i.e., \$10.00 Central Terminal Area, \$4.00 Lot A, \$2.00 Lot C, \$1.50 Lot VSP.
17. Take steps to eliminate the use of "voided" tickets as a means of providing approved parking for various categories of parkers such as Department employees, airline and government employees and vendors. The objective should be to establish a system to eliminate all voided tickets whereby each ticket dispensed from the machine at the lot entrance would result in a cash payment at the lot exit. This could involve the use of plastic key cards for employees, providing special parking spaces for vendors, or any of a number of other alternatives.
18. Direct the Department Parking Coordinator proposed herein to determine the impact of airport employee parkers on the availability of public parking in the Central Terminal Area. Subsidized parking for employees of Airport tenants at outlying lots should be evaluated.
19. Initiate a program for improved signs along freeways and City streets to provide better directional information to outlying airport parking lots. Consideration should also be given to electronic parking lot availability signs on Century and Sepulveda Boulevards and at entrances to Central Terminal Area parking lots.
20. Install signs on Flyaway buses and airport trams indicating Central Terminal Area stopping points for specific airlines, and, if feasible, place the same information on pass-out flyers to passengers. Consideration should be given to providing a readily identifiable basis to distinguish intra-

terminal trams from interconnecting parking lot trams, perhaps by painting them different colors.

21. Improve parking lot statistical reporting procedures by requiring:
 - a. Information concerning missing tickets to be shown on each parking lot daily statistical sheet.
 - b. Collection of data on long term parkers using lots for more than 12 hours.
22. Take specific action to improve security protection at Lots C and VSP.
23. Act upon the issues identified in this report involving the Operations Section, including:
 - a. Analyze and revise, as necessary, the Operations Section's responsibilities, organization structure, staffing, operational interfaces and procedures with the objective of improving operational effectiveness at LAX.
 - b. Clearly delineate responsibilities of all concerned agencies, i.e., Maintenance Division, Security Division, Los Angeles Police Department, U.S. Coast Guard, etc., interfacing with the Operations Section of LAX.
 - c. Update the LAX Operations Manual and the LAX Security Program to reflect changes in the Operations Section.
24. Work with Los Angeles Police Department management to form a unified security and law enforcement operation at the LAX. Consideration should be given to the following items:
 - a. Combining into one organization the separate organizational entities of the Security Division and the Airport Boarding Services Division, and eliminating the two different uniforms now worn by employees assigned to these units.
 - b. Eliminating duplicative patrol activities in parking structures and satellites between LAPD and Department security.
 - c. Providing a training program for all officers assigned to LAX which acknowledges the specialized operating characteristics of the Airport.
 - d. Examining the feasibility of placing total responsibility for airport security at LAX with the Los

Angeles Police Department, including consideration of the transfer of Department of Airports' security personnel and resources to the Police Department.

25. Work with the City Department of Transportation to determine the feasibility of transferring responsibility for traffic and parking control at LAX from the Department of Airports to the Department of Transportation.
26. Direct the Director of Maintenance Airports, in cooperation with the appropriate Airport Managers, to:
 - a. Prepare a Workload Analysis for maintenance at the Ontario Airport at least once each year prior to budget decision making, and make appropriate adjustments with respect to staffing and use of private contractors.
 - b. Develop and implement a formal, comprehensive and systematic inspection and work control program for maintenance at the Ontario Airport.
 - c. Consider implementation of a formalized inspection and work control program for maintenance at Los Angeles International and Van Nuys Airports, similar to that recommended above for the Ontario Airport.
27. Direct that a cost-benefit analysis be conducted to determine the feasibility of constructing a new central warehouse for the Department in the maintenance yard. Personnel involved in the implementation of the City's Materials Management Program should be contacted during this study to determine the feasibility of consolidation of some warehousing operations on a Citywide basis in this area of the City.
28. Instruct personnel from the Maintenance Division and the Purchasing Section of the Accounting Division to:
 - a. Meet and discuss means of improving materials management procedures at all airports, considering suggestions set forth in this report; and,
 - b. Initiate necessary action to improve procurement, storage, distribution and security of materials for the Maintenance Division, and require less involvement of craft supervisors in materials management functions.
29. Instruct personnel from the Accounting and Maintenance Divisions to jointly review the present method of apportioning materials costs for maintenance work to specific account numbers, and modify the procedures as appropriate to improve the accuracy of the charges.

30. Modify the organizational detail and relationships for the Department of Airports as shown on the Proposed Organization Chart (p. 68) and as described in the Organization Section of this report (p. 65).
31. Initiate an analysis of the processing of tenant construction project approvals by the Department, and develop and implement improved procedures to expedite the approval process.
32. Establish a comprehensive records management program to interface with the City records retention program. The services of a consultant should be obtained to design and implement correspondence control and forms control procedures, and to establish central files and reference library if desired.
33. Proceed expeditiously to establish a records retention program which complies with the City program in accordance with Section 12.6 of the Los Angeles Administrative Code.

IV. INTRODUCTION

This is the first management audit of the Department of Airports conducted by the City Administrative Officer. In accordance with City Charter Section 240.1, however, industrial, economic and administrative surveys have been performed every five years by independent auditors employed by the Department. The most recent such survey was performed in 1975.

The Department of Airports was created on October 1, 1928, and the airport, which had been known as Mines Field, became the Los Angeles Municipal Airport. The land was leased until October, 1937, at which time the City acquired ownership.

The Department of Airports, under its Board of Commissioners, is responsible for the management, supervision, and control of all airports and airport facilities under the jurisdiction of the City of Los Angeles. It constructs and maintains its own buildings and controls its own funds in accordance with the City Charter.

Los Angeles International Airport (LAX) is the Department's main facility. On May 17, 1950, the City Council passed an ordinance designating the Los Angeles Airport as Los Angeles International in recognition of its status as a major world transportation center. In August of 1961, the first airline moved into the present expansive terminal complex. With 500,976 landings/takeoffs and 28.4 million passengers in 1977, LAX ranks as the third busiest air travel center in the world. There are 13 ticketing/satellite buildings; a control tower - administration building; utility and central service buildings; five east-west runways and parking spaces for approximately 20,000 cars. It is estimated that LAX alone contributes \$7.4 billion annually to the economy of the Los Angeles area.

In 1967, operational control of Ontario International Airport in San Bernardino County was assumed by the Department under a joint powers agreement with the City of Ontario. The airport will become the property of the Department of Airports in the near future. This airport can be developed to serve 14 to 20 million annual passengers and thus serve as an important alternate airport to LAX. The present volume is more than two million passengers a year.

In 1949, the Department acquired the Van Nuys Airport from the Federal government. Van Nuys Airport is the nation's busiest general aviation airport with 592,863 takeoffs and landings. About 1300 private planes are kept at this airport.

The proposed Palmdale Intercontinental Airport is planned to meet the demands of the North Los Angeles County region. The 17,700 acre site for this airport is in the Antelope Valley northeast of the City of Palmdale and immediately adjacent to the 6,000 acre U.S. Air Force Plant 42, providing a total potential aviation area of 23,700 acres.

The Department's 1978-79 Budget provided \$36,018,075 for administration and operating expenses, \$15,322,290 for capital expenditures, and \$24,949,363 for other expenses, primarily bond redemption and interest. Receipts are estimated at \$67,919,493 with \$27,283,803 from aviation revenue, \$36,910,324 from concessions, and the balance from various sources. There were a total of 1,130 regular positions.

Each element of the Department's organization was reviewed by the Audit Team. In addition, major issues confronting Department management were examined. The audit specifically did not focus on risk management which was the subject of a separate study completed by a private consultant during the course of our effort. The City Administrative Officer has reviewed and commented separately on the Risk Management Study.

The audit report does not address each organizational element in the narrative, but does comment in each instance which provides significant constructive potential. The lack of specific comment may be assumed to mean only limited or no apparent prospect for improvement was found.

Section 240.1 of the City Charter requires that "at least once every five years" an independent survey shall be made "to ascertain if the Department is operating in the most efficient and economical manner". In the course of this audit we have reviewed consultant reports and recommendations prepared in 1969 and 1975 pursuant to the Charter requirement. For the most part, the Department has substantially complied with the intent of recommendations made by the consultants to improve operations and planning. In the few cases where the Department has made less than adequate progress toward implementing what we consider to be valid proposals, further recommendations have been made as a part of this audit.

Members of the Department of Airports at all levels were interviewed. The Team wishes to express its appreciation for the assistance and cooperation extended.

The findings and recommendations of the audit have been reviewed with Department Management. The General Manager has stated his general agreement with most of the recommendations. Specific disagreement exists with respect to Recommendation Nos.

lle, 23 and 30. In addition, the General Manager has expressed certain reservations regarding Recommendation Nos. 12, 16 and 25.

V. FINDINGS

ECONOMIC BENEFIT OF AIRPORTS TO THE CITY

Any evaluation of the Department of Airports should give consideration to the impact that the airports' activities have on the economy of the City and the surrounding area. While the contribution of LAX to the area's economy appears obvious, evaluation of some quantitative data relative to that economic impact seems appropriate. The following data was extracted from a 1976 research report by the consulting firm of Waldo & Edwards, Inc., on "The Economic Impact of Los Angeles International Airport on its Market Area". No attempt has been made here to update the data.

The Airport Service Area was defined as the entire five counties of Ventura, Los Angeles, Orange, Riverside and San Bernardino. At that time population of the five counties was 10.3 million, non-agricultural employment 4 million, and total personal income \$68.5 billion annually.

The consultant found that air carriers, concessionaires, ground transportation companies, aircraft and aviation service companies, and government agencies associated with air transportation at LAX provided direct employment for 39,000 full time employees.

Travel agencies and other services available to air visitors to the area provided indirect employment for an additional 31,000 full time employees. The consultant estimated that 1.5 non-basic jobs were induced by each direct and indirect employee, providing 94,000 jobs. In this manner, it was estimated that LAX activities provided employment for a total of 164,000 persons within the five county area.

The total payroll for the 164,000 employees was estimated at \$.838 billion annually. Airport industry purchases of local goods and services were estimated at \$.607 billion annually, and airport visitor expenditures at \$1.495 billion annually. Induced economic benefits from these expenditures were estimated at \$4.470 billion. Accordingly, a total economic benefit to the Airport Service Area was estimated at \$7.410 billion annually.

Although not covered in the consultant's report, other benefits come to the City and County taxing jurisdictions in the form of possessory interest tax revenues. In fiscal 1977-78, the 85 tenants holding ground leases at LAX paid City-County taxes in the amount of \$8,541,730. In addition, 30 tenants holding ground

leases at Van Nuys Airport paid City-County taxes in the amount of \$482,492.

Considering the foregoing and the numerous major corporations which are headquartered in the Los Angeles area and Southern California, one can only speculate on the very real and extensive contributions which LAX has made to the economic growth of the area.

RELATIONSHIPS WITH REGULATORY AGENCIES

Operating a system of airports requires continuing contacts with governmental agencies responsible for insuring compliance to laws, rules and standards regulating civil air travel operations. The primary regulatory agencies are the Federal Aviation Administration (FAA), the Civil Aeronautics Board (CAB), and the California Transportation Department (CALTRANS).

The FAA is responsible for the establishment of minimum standards of safety and security for airport operations. It establishes flight patterns at airports and the safe flight paths for aircraft under their control; it licenses pilots, certifies airworthiness of aircraft; and it also licenses airports to operate -- considering factors such as site, runways, crash equipment and other aspects of safe operation.

The CAB establishes and enforces regulations which promote and maintain the Nation's air transportation system. It must approve the establishment or discontinuance of service between cities including the maximum air fares charged. While the CAB determines the route over which an air carrier may operate and the maximum fare it may charge, the air carriers themselves establish the schedule.

CALTRANS is the state agency responsible for insuring that regional airport planning and operations are in compliance with the State's master transportation plan as it affects air and ground transportation systems. Also, it administers the California Noise Law and some general aviation funding.

Each of the above agencies and others were contacted by the Audit Team. The general consensus was that relationships with the Department of Airports were excellent, that management has always been cooperative, and that any problems known to exist are in the process of satisfactory resolution.

REGIONAL AIRPORT AUTHORITY

The City of Los Angeles, through its Department of Airports is unilaterally functioning as a "regional airport authority" by operating Los Angeles and Ontario International Airports, and by committing to the development and operation of the proposed Palmdale International Airport. In providing this service to the public, the City is facing increasing liabilities arising from noise litigation, financing major new construction projects, and other legal, social and economic concerns. A broader assumption of responsibility by all concerned governmental entities through the means of a regional airport authority has been proposed to best solve these problems.

In his March 1, 1976, report to the Board of Airport Commissioners on the subject of "Proposed Regional Airport Authority," the General Manager revealed that the City has vastly increased its exposure to legal liability in operating a regional airport system. Not only was there a problem in raising capital for the system, but,

Casting its shadow over the entire situation is the problem of the airport proprietor's financial liability due to the cumulative effects of aircraft noise upon adjacent communities. The courts have held that the airport proprietor is financially responsible for the effects of this noise.

The City of Los Angeles then, acting as a proprietor through the airport commissioners, finds itself inadvertently in the position of operating a regional airport for the benefit of the ten southern counties in California; yet, at the same time being solely responsible for the financial liability that such operations have and may incur in the future.

Looking then at the joint problems of capital financing and financial liability, it does seem most appropriate that I raise to you the question for determination at this Commission level, as well as at the highest policy levels of the City, as to whether or not, in the long-term future, the City of Los Angeles should continue to operate the Los Angeles Airport System under the circumstances as they presently exist; or should, in fact, the City take leadership in the development of a broad based regional authority, coextensive with the market

place. It does seem to me that the subject of the development of a regional airport authority, capable of assuming the future burdens and created with a broad enough base so as to spread the liabilities, as well as the benefits, over the market place, is a subject well worthy of serious public debate.

The need for a form of regional airport authority is longstanding and has been recommended by several groups studying the subject since the early sixties. Excerpts from four of these major studies are reproduced in Appendix B to this report.

In October 1976, the Board of Airport Commissioners adopted a position to support the creation of a regional airport authority, and forwarded a study of a proposal to establish such an authority to the Industry and Transportation Committee of the Los Angeles City Council for its consideration.

On December 14, 1976, the City Council adopted a proposal which formed a committee to study the creation of a regional airport authority. This action was in response to a Department of Airports request to have the City Council conduct the necessary investigations and debate to determine if such an authority should be formed and the basis upon which it might be formed.

The Committee consists of the following members: (1) representative of the Mayor; (2) member of the City Council; (3) representative of the Board of Airport Commissioners; (4) representative of each of the counties of Los Angeles, Ventura, San Bernardino, Riverside, Orange, and Imperial; (5) General Manager of the Los Angeles Department of Airports; (6) representative of the City Attorney; and (7) representative of the City Administrative Officer. The Committee has met on several occasions and has developed a draft legal agreement for the purpose of creating a basis for joint exercise of power to seek funding, and employ qualified consultants to develop a structure and implementation plan for a regional authority.

SCAG is currently sponsoring a three-part project funded through the FAA totaling \$763,864, entitled "SCAG Continuous Regional Airport System Planning Program." The grant was accepted on April 6, 1978, and is expected to be completed in the near future. The specific objectives of the grant are:

To update projections of air passenger demand for the SCAG region; to update forecasts of air carrier and general aviation air operations; to identify shortfall, if any, of the capacity of the existing airspace and airport system for handling the

projected air passenger demand and air operations; to identify alternative air carrier airport locations to handle any identified shortfall in capacity; to analyze the benefits and disbenefits of the alternative locations; to determine the institutional structures which are best suited for implementing the airport alternatives, and to recommend airport development alternatives to the Airport System Element of the 1979 SCAG Regional Transportation Plan.

The outcome of SCAG's study on the regional airport system is a critical prerequisite for specific planning. SCAG's Regional Transportation Plan states that a forecasted regional air-carrier passenger travel demand of 44 to 48 million annual passengers (MAP) will exist in 1985; and 88 to 97 MAP in 1995. However, current data indicate that the regional airport system (with presently planned expansions of existing facilities) will accommodate only 64 to 85 MAP by 1995. This forecasted deficiency points out the need for immediate capacity expansion, before 1985 or 1990, to serve the anticipated demand. Because of the limited growth potential of Burbank-Glendale-Pasadena, Orange County and Long Beach airports, which cannot be expected to serve more than a total of 4.5 MAP, it appears that the burden of air passenger accommodation in the overall Southern California area will fall to the City of Los Angeles' international airports at Los Angeles, Ontario, and possibly at Palmdale.

There is an apparent inconsistency between the proposal to establish a regional airport authority to plan and finance future airport development, and the Department of Airports' present capital improvement program which projects massive funding for the development of both Ontario International Airport and the future Palmdale Airport. In Ontario, the Department has a legal commitment in connection with its lease/purchase of airport property, whereby the Department has agreed to make extensive improvements to the runway and terminal facilities.

The Department has made a major commitment to the development of the Palmdale facility in terms of land acquisition over the last 10 years. The present capital improvement program projects some \$63.3 million worth of site development improvements to begin in April 1982. Air field and terminal construction is scheduled to begin in 1984. Projections regarding Palmdale development at this point are optimistic. Furthermore, environmental concerns, the lack of water, and the lack of a rapid transit system to move people from Palmdale to the Los Angeles area are issues which involve major expense and probably will delay airport development. At present, the airlines apparently have little interest in the development of a Palmdale facility. Rather than splitting operations in the Los

Angeles area, the airlines would prefer to see LAX capacity increased beyond its present projected maximum of 40 MAP. They have even been hesitant to support the further development of Ontario because it would split their operations.

Given the Department's present plans for capital development of its facilities, other jurisdictions which might otherwise consider more seriously the formation of a regional airport authority have no incentive to do so. A question is therefore raised as to whether the Department should unilaterally go beyond an established limited development of present facilities in the absence of a regional authority. A policy should be established by the City Council which would give notice to all jurisdictions concerned that a joint venture effort would be required in the development of future airport facilities, e.g., Palmdale and perhaps even LAX and ONT. The City may solidify its position in support of a regional airport authority through its refusal to make unilateral capital expenditures. See Recommendation No. 1.

It is not reasonable to expect the City of Los Angeles to singlehandedly attempt to meet the regional air transportation demand by further acquisition and development of airport facilities far beyond the City's boundaries. However, this report does recommend that Ontario development be accelerated as a matter of critical priority because of the existing Joint Powers Agreement with the City of Ontario, the need for immediate relief at LAX, and the fact that there is no reasonable alternative at present. See Recommendation No. 3.

The City of Los Angeles should be a major participant in any regional airport organization in recognition of the far-reaching scope of its investments and the impact any additional regional airport facilities will have on the citizens of Los Angeles. In planning a regional airport authority, it is important to note that air travel is but one aspect of the overall transportation system in Southern California. The total transportation system consists of all transportation modes and facilities, including highways, airports, public transit, automobiles, harbors, railways and others. To place undue emphasis on air transportation at the expense of the other forms of transportation would produce a one-sided system which would be less efficient and effective than one properly integrated with all the transportation modes.

With the forecasted inability of the air transportation industry to meet the new demand, other transportation modes will have to fill the need. Planning and implementation of alternatives for "short haul" travel should begin as soon as possible to fill the vacuum created by the air services deficiency. Air transport planning must consider short haul

traffic alternatives, such as, high-speed ground transportation systems. These alternatives can relieve the impact of major air carriers, affect airport design and location, as well as provide a proper mix and balance between air and ground modes of travel. See Recommendation No. 2.

ENVIRONMENTAL ISSUES

Since 1970, an important factor in planning for airport development has been the requirements of Federal and State environmental legislation. The National Environmental Protection Act of 1969 (NEPA) and the California Environmental Quality Act of 1970 (CEQA) call for detailed reports on any project which may have a significant impact on the environment. Major environmental impact reports on the planned overall development of L.A. International, Ontario and Palmdale Airports were completed in 1978 after having been in process for a number of years at a cost to the Department of more than two million dollars. In addition, detailed environmental studies are required for each major airport project before construction can begin.

The lengthy and complex processes involved with the preparation of environmental reports, and their review by State and Federal agencies have significantly delayed the completion of planned capital projects, although demand factors and changing priorities have also contributed to the slippage.

The concern of neighboring communities over noise and traffic congestion around the airports has affected both operations and development planning. In recent years the Department has lost some \$26.5 million in litigation on noise issues. In addition, to avoid further potential lawsuits the Department has spent more than \$100 million to purchase residential land north and east of LAX for a buffer strip between the airport and surrounding homes. These expenditures for land acquisition and litigation related to noise problems at LAX have diverted funds generated for the purpose of capital development.

Noise at LAX is the subject of a separate discussion elsewhere in this report.

Notwithstanding the negative impact on airport capital development in terms of lengthy delays and substantial expense, legislative benefits have also accrued. The benefits have been the assurance that development plans give at least some credence to environmental concerns, and an opportunity is provided the public to review project proposals and make some input to the final decisions.

PLANNING OBJECTIVES FOR AIRPORT DEVELOPMENT

Planning for airport development has become increasingly difficult over the years as Department management seeks to provide facilities, services and controls to meet the needs of the airline industry, the traveling public and the surrounding communities impacted by airport operations. It is essential that planning objectives be established and regularly updated to reflect this variety of concerns and to guide the day-to-day management decisions of the Commission and the General Manager.

Department planning objectives are spread among Commission policy resolutions, various environmental impact reports and airport plans for each facility. These objectives should be consolidated in a single document, as recommended in the 1975 Peat, Marwick, Mitchell audit, so that all interested parties will be aware of how the developments at each airport relate to each other, and what the role of the Department is to be in meeting the future airport needs of the region. Objectives can then be clearly correlated with specific projects in the capital program, with land use decisions pursuant to the Department's leasing program and with proposed operating procedures. Objectives and the assumptions which support them should be reviewed in light of accelerated passenger demand, airline fare deregulation, growing access problems and other change factors.

Objectives should also be reviewed in the context of a growing emphasis on broad based transportation planning studies by regional agencies such as the SCAG. The SCAG 1977 Regional Transportation Plan (the most recent formally adopted RTP) includes the following significant policy statements relating to Department facilities:

1. Distant remote terminals located in the high-density centers of the Los Angeles metropolitan area and providing fast, convenient service directly to aircraft at Los Angeles International Airport should be in operation by the early 1980's.

As an incentive to reduce vehicular congestion at LAX, does the Department plan to develop additional remote facilities? If so, how reasonable is the "early 1980's" time frame?

2. Land around Los Angeles International Airport should be purchased or in some other manner

brought into conformance with the criteria of the California noise regulations.

As mentioned elsewhere in this report, the Department should develop a specific plan to meet State land use compatibility standards by 1986.

3. Ontario International should be developed to enable 4 to 6 million annual passengers to be enplaned and deplaned by 1985....

This objective is far short of the 12 MAP demand forecast in the EIR for Ontario. If LAX is to peak at 40 MAP by 1985 or before, passenger handling capability at Ontario must be greatly increased. Extensive terminal and access improvements will be necessary. Future noise and land use problems must be anticipated and resolved as operations increase, to avoid a repeat of what has occurred at LAX.

4. Construction of a high-speed ground access system is essential to the development of the proposed new Palmdale International Airport. Without such a system a relatively small demand is forecast, and reliance should be placed upon expansion of the existing Air Force Plant 42 facilities.*

Rapid transit between Los Angeles and Palmdale is not financially feasible at this time. The scope of Department development plans for a new Palmdale Airport seems unwarranted in light of the 12 MAP forecast there by 1995. Furthermore, development of this facility should not be the responsibility of the City, but of a regional authority as proposed elsewhere in this report.

These SCAG policy statements and others should be reconciled with Department stated objectives so that future airport development is in line with regional planning concepts. After the policies are reviewed and consolidated into a single document, priorities should be established to guide future specific project planning. See Recommendation No. 6.

*The 1978 draft Regional Transportation Plan developed by SCAG does not include this policy statement. The need for development of an airport at Palmdale is addressed in commentary. To date there has been no final 1978 Plan adopted.

EXCESSIVE CONGESTION

Designed initially to accommodate 23 MAP by the year 2000, L.A. International Airport exceeded 32 MAP in 1978. Passenger traffic at LAX has steadily increased over the years, and, most recently, devaluation of the dollar, deregulation of airlines and associated low fare flights have caused a sudden spurt in growth. Passenger volume for the first half of 1978 was up 15% over the previous year. If the current trend continues, within two or three years LAX will reach 40 MAP, a maximum established by City Council policy in 1974. Even if growth levels out to historic increases of 6-10% yearly, 40 MAP will be reached by 1983.

Over the years Department management has tried to keep up with the congestion problems in the Central Terminal Area by providing alternatives such as peripheral parking lots with tram service, and "fly away" bus service to LAX from the Van Nuys Airport. However, the phenomenal growth rate at LAX has far surpassed the completion of improvements intended to cope with increasing traffic volumes. Planning is underway for a double-decked roadway within the CTA, but construction will not be completed for at least five years. The Department plans further development at Ontario International Airport (ONT) as a reliever facility for LAX, but major terminal improvements there are also several years away.

Meanwhile, the ground access conditions in and around LAX are getting progressively worse, as clearly evidenced during the heavy travel periods of the last year. Peak hours for scheduled flights around noon, in the early evening and on weekends have frequently brought vehicular traffic to a standstill. As passenger volumes increase, periods of extreme congestion are bound to increase.

Compounding the problem of growth has been the fact that anticipated freeway improvements to relieve surface street congestion around LAX have not materialized. The Council approved policy limiting LAX to a maximum of 40 MAP was in part predicated upon these planned freeway projects which have since been severely delayed. The absence of an adequate street and freeway system necessarily raises a question regarding the feasibility of allowing growth to 40 MAP at LAX.

The Department has in the past tried to accommodate vehicular traffic entering the terminal area, which is a major cause of congestion. A new orientation is required to direct traffic to peripheral parking lots and expand bus service to LAX

from outlying areas. Plans are already progressing to establish passenger drop-off points in the peripheral lots so that well-wishers need not enter the terminal complex. Signs are being installed to advise drivers of heavy terminal area congestion at peak hours and recommend use of the peripheral lots. Fees for long-term parking in the CTA have recently been raised as an economic disincentive which should free up more parking for short-term use. As a further inducement for patrons to use peripheral parking, fees for the use of Lots C and VSP should be sharply reduced and perhaps even eliminated. In June 1979, the Department began an experimental program of reduced rates in peripheral lots.

Unless immediate short-term operating changes are implemented to cope with traffic congestion until adequate capital improvements are completed, there will be no alternative but to place a limit on passenger traffic, especially during peak hours of activity. Staff should begin now to analyze methods whereby such limits may be imposed if necessary. See Recommendation No. 5.

The Ontario facility is projected to accommodate 12-15 MAP compared to the 1978 level of 2.0 MAP. There is tremendous potential demand for ONT service from the San Gabriel Valley eastward, and particularly from Orange County, which presently accounts for some 23% of the passenger load at LAX. Improvements at ONT are needed to provide the airlines with a viable alternative to increasing the overload condition at LAX.

Phased plans to develop additional terminal space at ONT over the next nine years should be accelerated. Steps should be taken to begin design of Phase I of the terminal expansion as soon as possible. Staff should be assigned immediately to prepare a comprehensive development plan for related ground access and parking. The details of a possible freeway connection and railroad crossing will involve extensive coordination. Additional land may be needed north of the Airport for access improvement, and perhaps south and east of the Airport for future aircraft maintenance and related facilities. The overall development goals for ONT must be reviewed in relation to growth plans for LAX and in the absence of firm plans for any new major airport facility in the area.

Service levels at ONT have already increased and must be further expanded as an incentive to passengers to use the facility. The Department and the airlines must recognize the long-term limitations at LAX and move ahead with development at ONT. See Recommendation No. 4.

Finally, the Department must reevaluate its overall growth policy for LAX in light of the several variables which

have occurred since the Council established a 40 MAP limit in 1974. Then it was expected that the limit would not be reached until about 1990, by which time developments at Ontario, Palmdale and elsewhere would be sufficient to accommodate the additional demand. At this point the 40 MAP limit is nearly upon us, but reliever facilities have yet to be developed. Although the 40 MAP limit is still Department policy, it would be difficult to enforce under present conditions. It is imperative that the Department and the airlines reevaluate the 40 MAP limit at LAX. Furthermore, it is essential that they recognize their responsibility to help solve the surface street congestion problems affecting both airport operations and surrounding communities. See Recommendation No. 5.

NOISE AT LAX

Noise control has been a persistent environmental problem at LAX since jet commercial airline operations commenced in January 1959. Noise was a factor in the 1974 Council decision to limit growth at 40 MAP, and it has had a major impact on capital development and operations. As mentioned earlier, the Department has expended many millions for noise litigation and for the acquisition of residential land that is incompatible with aircraft operations.

Historically, the Board of Airport Commissioners has urged Federal action on the jet noise problem to include aircraft noise standards and noise abatement rules. Management has supported the control of aircraft noise at its source as a more efficient alternative to massive land acquisition in airport areas. In 1970, the General Manager urged the immediate retrofitting of aircraft to meet Federal noise standards, to be financed in part by a ticket surcharge. Federal regulations are now in effect which establish specific noise limits to be met by 1985.

In 1971, the State established standards "to protect the public from noise and to resolve incompatibilities between airports and their surrounding neighbors." The standards require a progressive reduction in noise levels through January 1986. Airports are defined as having a "noise problem" if sound levels outside the airport boundary exceed established limits and if land uses in the affected areas are considered to be incompatible with airport purposes (e.g., residential uses and schools). LAX has a noise problem as defined in the State regulations, and must therefore maintain a noise monitoring system to establish the magnitude of the problem and measure the effect of noise abatement policies. Since LAX is presently operating in non-compliance with the State standards, management must annually request a variance. To date, the Department has not developed a plan of action to bring LAX within the State standards by 1986. See Recommendation No. 7.

The Department has taken some action to deal with noise levels at LAX, most notably through the restriction of night operations, requiring aircraft approaches and takeoffs over the ocean instead of over residential areas to the east, between midnight and 6:30 a.m. A regulation has been approved by the Commission which sets a limit on the overall levels of aircraft noise, and provides a schedule to be completed by 1985 for implementing the Federal noise standards. The Department has plans for the construction of an earthen sound barrier north of

the Airport as a test project to block aircraft noise from nearby homes.

The Department has not yet acknowledged that even after 1985, when all jet aircraft will be required to meet Federal noise standards, sound levels in some residential areas surrounding LAX will still be excessive by State standards. The Environmental Impact Report (EIR) for LAX has warned that even with quieter jet engines, the construction of sound barriers adjacent to noise-sensitive areas, noise abatement operational techniques and other mitigation measures, some areas will continue to be adversely impacted. The EIR suggests that the conversion of noise-sensitive areas to compatible uses such as commercial/industrial or related airport uses may be the only viable alternative to "either closing the Airport or substantially reducing the number of flights" if the State noise standards are to be met. Planning coordination between the Department and surrounding communities for future land use conversion should be improved. A program should be established to eliminate incompatible land uses through zoning control and possible land acquisition and redevelopment which will meet the 1986 State standards. See Recommendation No. 8.

A study concerning Airport Noise Control and Land Use Compatibility (ANCLUC) has been initiated under the authority of the FAA to encourage joint Airport/Community resolution of long-standing noise control problems. Federal financing for the study has been arranged. This project presents an excellent opportunity for a mutual airing of concerns and goals regarding LAX development, surrounding land use compatibility and the Department's commitment to deal directly with environmental problems such as noise. Congressional action is pending which would provide funds for the acquisition and conversion of land to make it compatible with airport operations.

As the Department reevaluates its overall growth policy for LAX pursuant to recommendations in this report, the cost of resolving environmental problems created by airport operations must be part of the equation. Airport management must work cooperatively with surrounding communities, just as the City would have the recently established Burbank-Glendale-Pasadena Airport Authority address the concerns of Los Angeles residents impacted by aircraft noise. Management must recognize the environmental compatibility of airport growth as a responsibility equal to that of accommodating the needs of the airline industry.

MAXIMIZING REVENUE FROM PROPERTY DEVELOPMENT

The financial relationship between DOA and the airlines, as detailed elsewhere in this report, appears to provide a disincentive for maximizing revenue. Operating deficits are recouped from landing fees, and excess profits are turned back to the airlines. The development and leasing of airport property is one aspect of the revenue picture which deserves specific attention in this regard.

At LAX, considerable residential property has been acquired over the last ten years to alleviate problems with the Westchester community over noise from jet operations on the north runway complex. Acquisition costs have been partially offset by Federal grant monies, and additional offsetting revenue is expected to be generated as the land is developed for commercial/industrial and recreational uses more compatible with Airport operations.

Acquisition is now virtually complete. Plans were completed in 1974 to develop a golf course, with tennis courts and dining facilities on roughly 260 acres in the Playa del Rey acquisition area. Environmental interests have blocked progress in an effort to restore this Coastal Zone area to its "natural state." However, concern centers on the south 40 acres, which could be set aside as a nature conservancy, allowing the planned recreational development to proceed on the remaining acreage. Potential lease income from the property if developed for recreational purposes, would be roughly \$590,000 annually. (Following completion of audit field work and prior to release of this report, the Department has accepted a specific proposal to develop this area for recreational purposes.)

In 1968, a tentative tract map was filed pursuant to development of acreage in the west maintenance area. Lease proposals were developed for the construction of two major airline maintenance facilities there, but plans were aborted due to litigation and other delays. The completion of zone change requirements and ground preparation necessary for alternative development projects has not occurred. Potential ground rental income from this property is substantial. Beyond the revenue aspect, unavailability of the west maintenance area precluded relocation of a Pan American Airlines maintenance leasehold from the south side of the Airport to the west area. Pan American's south side location, which borders the City of El Segundo, is master planned for a buffer zone, restricted to quiet uses. El Segundo protested the lease renewal of this south area to Pan American for noisy maintenance activities. Had the west

maintenance area been properly zoned and improved, the leasehold could have been moved there, and the controversy with El Segundo might have been altogether avoided.

Since early 1978, the Department has worked with Planning Department staff to establish a procedure for the orderly rezoning of Airport properties preparatory to development. To hold the momentum of this initial effort, an action plan should be established and staff members assigned specifically to accelerate progress on zone changes and land lease proposals. The impact of development, especially on existing surface street congestion, will have to be considered as part of the overall review of LAX growth plans discussed elsewhere in this report. It will be necessary to work with the Planning and Transportation Departments to identify the related public improvements required and determine the financial responsibility of participating agencies. A step-by-step plan along with a reasonable timetable should be presented to the Board of Airport Commissioners for a policy commitment to proceed. See Recommendation Nos. 9 and 10.

The Board of Airport Commissioners has recently authorized a contract with a consultant to perform an economic feasibility study to aid the Department in its determination of the development of the North Acquisition Area. This is a necessary initial step which should be followed by specific planning and action to place this property in a productive status.

FINANCIAL MANAGEMENT

The Department of Airports continues to maintain a strong financial position. A large cash reserve is maintained in accordance with Charter requirements. Revenues from aviation and other sources have steadily increased over the years. Landing fees to the airlines are among the lowest of any major airport in the country. Capital improvements have been financed with revenue bonds at no cost or liability to the general City taxpayer. Because of the Department's strong financial position and its financial arrangements with the airlines, the Department is able to issue revenue bonds as required to finance large capital improvements. An estimated \$535 million dollar capital program to be financed by revenue bonds is anticipated over a period extending into the mid-1980's.

The Department reimburses the City's General Fund annually for services provided by other City departments. It has also arranged to reimburse the City's General Fund for the City's investment in LAX originally financed by the issuance of general obligation bonds.

The Department's financial and operational arrangements with the airlines as incorporated in the operating agreements have been mutually beneficial to the airlines and the Department during the period of major growth and development. However, at this time the Department of Airports is facing different kinds of problems, especially in relation to congestion at LAX and the environmental and operational impact of the City's airports on nearby communities. In light of these demands, it seems appropriate at this time to reevaluate the propriety of some of the financial provisions of the operating agreements. For similar reasons, the Department should initiate a formal and thorough financial planning and analysis program to implement financial planning goals. Such goals should be formally approved by the Board. A detailed discussion follows in subsequent paragraphs.

Legal Bases

The City Charter, Master Revenue Bond Resolution, and the operating agreements with the airlines constitute the legal bases of the Department of Airports' financial management and fiscal operations.

City Charter Section 239.8 established the Airport Revenue Fund under control of the Board of Airport Commissioners, depository for which is the City Treasury. All revenues and

expenditures pertaining to the operation of the City-owned and controlled airports and related facilities are credited to or disbursed from the Airport Revenue Fund. The Airport Revenue Fund is specifically exempt from Charter Section 382. Accordingly, the Council has no authority to direct by ordinance that surplus funds be transferred to the General Fund.

In 1963, the Charter was amended to authorize the issuance of revenue bonds. Charter Section 240 authorizes the Department of Airports to borrow money, issue revenue bonds, and refund indebtedness "solely out the Airport Revenue Fund and not out of any other fund or monies of the Department of Airports or the City".

A Master Revenue Fund Resolution approved in 1968 by the Board of Airport Commissioners (and not subsequently disapproved by the Mayor and Council within the time provided for under Charter Section 240 and 240.2) authorizes the issuance of 410 million dollars in Department of Airports' revenue bonds. With the recent sale of 255 million dollars in bonds, the full \$410 million authorization has now been used. The Master Bond Resolution also provides for various covenants with bondholders which are deemed necessary and desirable to facilitate the issuance and sale and for the protection and security of the bondholders.

The operating agreements with the airlines originated in June, 1943. Leases were signed with five major airlines to transfer operations from Lockheed Air Terminal in Burbank to Los Angeles Airport. In December, 1946 all five airlines moved and began their operations. The leases with the five major airlines became effective during 1947 for a term of 30 years with an option to extend for an additional 10 years. The options were exercised extending most leases to 1987. Recently, all leases have been amended extending them to December 31, 1992.

During the 32-year interim the leases have been amended many times. An additional six airlines now have leases which specify that they shall have the same landing fees as are paid by the five original airlines. Another 26 have landing agreements which are subject to adjustment by the Department of Airports at least annually. As of this date, approximately 40 original tenant and scheduled airlines are in effect operating under agreements containing these same commitments.

In 1967 the operating agreements with the airlines were amended to provide for the airlines to "guarantee" the Department of Airports a "net income" (before depreciation, interest and amortization) of 1.25 times the maximum debt service on all outstanding bonds. This 1967 guarantee was limited to the next \$300 million in bonds to be issued. The operating agreements

were amended very recently increasing the guarantee to 515 million dollars.

Current Status of Bond Authorizations

A comparison of the status of bonds authorized and issued under the Board's Resolution with those applicable to the airline operating agreements is summarized below.

<u>Bonds Issued Under Board's June 26, 1968 Bond Authorization</u>	<u>Bonds Issued Under October 1, 1967 DOA - Airlines Operating Agreements (as amended October, 1979)</u>
Authorized	Maximum Coverage
<u>\$410,000,000</u>	<u>\$515,000,000</u>
Issued	
1965	\$ 30,000,000
1967	75,000,000
1970	60,000,000
1973	20,000,000
1974	40,000,000
1975	35,000,000
1979	<u>255,000,000</u>
Authorized but not issued	Remaining Coverage
<u>None</u>	\$ <u>None</u>

The Department now anticipates that another \$535 million will be required for major capital development in the near future. The first phase will be financed by the \$255 million dollar proceeds from the recent bond issue.

Financial Provisions of Airline Operating Agreements

The Department of Airports generates revenues under several hundred leases and contracts with users of airport facilities. Facilities for concessions, restaurants, and car rentals are usually leased to the highest bidders. Other facilities, structures and ground spaces are let under negotiated leases. The income from these non-airfield sources, in effect, partially subsidizes the cost of airfield use. Landing fees paid

by air carriers are calculated to cover only that portion of the airport expenses not recovered from other non-airfield sources of revenue. The actual payment by each airline depends on the weight of flights landed by that airline during the fiscal year.

Airfield costs subsidized by non-airfield revenues frequently result in extremely low landing fees for each flight. When non-airfield revenues are high, landing fee revenues tend to be low. One research study has argued that this arrangement encourages wasteful use of airport facilities; that it leads to an uneconomically large number of flights at peak times; that airlines are encouraged by their passengers and low landing fees to schedule flights at popular travel hours; and that it can lead to congestion of airport facilities.

The extent to which these arguments have validity at LAX is debatable. It is a fact, however, that by virtue of the operating agreements, airfield costs are subsidized to some degree by non-airfield revenues.

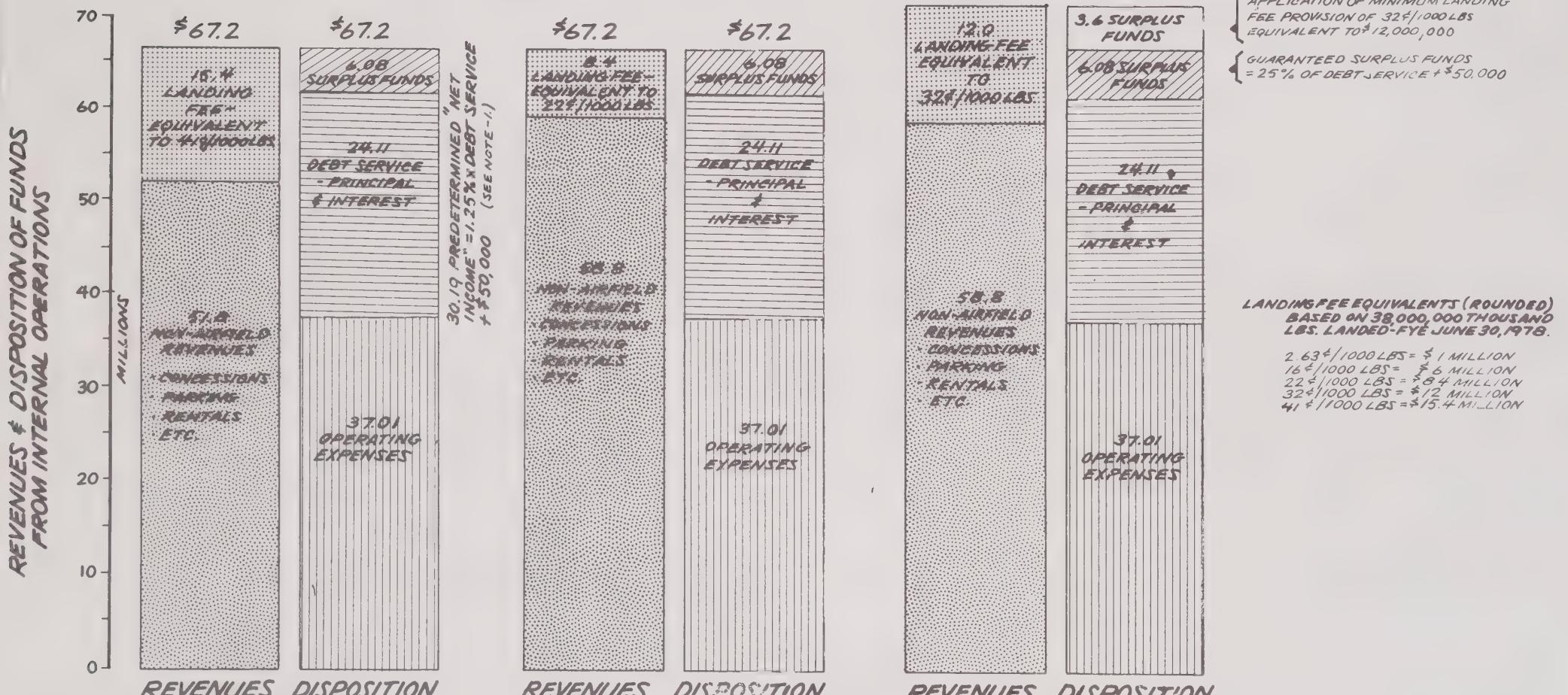
The resultant effect of the airline guarantee in the operating agreement is the establishment of a predetermined net income for the Department of Airports. The agreements provide for the landing fees to be the equalizing factor. Landing fees are billed based on estimates made at the beginning of the year. If at the end of the fiscal year net income is deficient, an upward adjustment to landing fees is made to achieve the predetermined net income. If net income (operating revenues from all non-airfield sources less operating expenses) is more than sufficient, the landing fees are adjusted downward to achieve the predetermined net income. In this sense the landing fee component is residual. The results of operations after the landing fee adjustment for Fiscal Year Ended June 30, 1978 are depicted graphically on the chart on the next page.

The agreements also provide that landing fees will not be reduced below a minimum of 16¢ per 1000 pounds of weight of flights landed, which at the current level of operations converts to approximately \$6 million annually. The 16¢ minimum, originally incorporated in the agreements in 1967, is now so low as to have no practical effect. As shown on the chart, actual landing fee revenue for FYE June 1978, after adjustment, was \$15.4 million, equivalent to 41¢ per 1000 pounds.

The major advantage of the agreements to the Department and to the City is that they have permitted the Department to issue revenue bonds at favorable interest rates with no burden or obligation to the general City taxpayer. The Department also enjoys the benefit of technical consultation and advice from the airlines on general airport planning and on specific capital improvement projects. The existing operating agreements have

FINANCIAL PROVISIONS OF AIRLINES OPERATING AGREEMENTS-ILLUSTRATED.

(MILLIONS)



ADDITIONAL SURPLUS FUNDS THAT
WOULD BE GENERATED BY
APPLICATION OF MINIMUM LANDING
FEE PROVISION OF 32¢/1000 LBS
EQUIVALENT TO \$12,000,000

GUARANTEED SURPLUS FUNDS
= 25% OF DEBT SERVICE + \$50,000

LANDING FEE EQUIVALENTS (ROUNDED)
BASED ON 38,000,000 THOUSAND
LBS. LANDED-FYE JUNE 30, 1978.

2.63¢/1000 LBS = \$1 MILLION
16¢/1000 LBS = \$6 MILLION
22¢/1000 LBS = \$8.4 MILLION
32¢/1000 LBS = \$12 MILLION
41¢/1000 LBS = \$15.4 MILLION

FISCAL YEAR ENDED JUNE 30, 1978
• ACTUAL RESULTS OF OPERATION
• MINIMUM LANDING FEE OF
16¢/1000 LBS.
• 38,000,000 THOUSAND LBS LANDED

ILLUSTRATION NO. 1
• ASSUMES \$7 MILLION
INCREASE IN NON-AIRFIELD
REVENUES.
• ASSUMES EXISTING MINIMUM
LANDING FEES OF 16¢/1000 LBS.
(\$6 MILLION).

ILLUSTRATION NO. 2
• ASSUMES \$7 MILLION INCREASE IN
NON-AIRFIELD REVENUES
• ASSUMES REVISED MINIMUM
LANDING FEE OF 32¢/1000 LBS.
(\$12 MILLION).

been mutually beneficial to the Department of Airports, the airlines, and the City during the period of major growth and development at LAX.

The major disadvantage to the Department is that the agreements limit the amount of funds the Department of Airports can generate internally from operations for use of capital development. At the current level of debt service, the maximum amount of funds that can be generated from internal operations is basically 25% of the maximum debt service of \$24.11 million, or approximately \$6.03 million annually. This is depicted graphically in Illustration No. 1 of the accompanying chart which assumes a \$7 million increase in non-airfield revenues. It also assumes retention of the existing minimum landing fee provision of 16¢ per 1000 pounds. Under the terms of the agreements the \$7 million increase in non-airfield revenues is offset by an equivalent reduction in landing fee revenues from \$15.4 million to \$8.4 million. The latter is equivalent to 22¢ per 1000 pounds, still considerably in excess of the 16¢ minimum. In this manner the predetermined net income is achieved in accordance with the terms of the agreement.

Because the agreements limit the amount of surplus funds that can be generated internally, the Department must rely on issuance of revenue bonds and governmental grants for major capital improvement financing. To the extent that additional funds might be generated internally from operations, revenue bond financing and its heavy debt service over many years could be reduced. Also, the Department would have more discretion over the use of funds generated internally.

Because of the limitation on the amount of surplus funds that can be generated internally, there exists little urgent incentive for management to strive to maximize net income by reducing costs or by increasing revenues from other sources such as leases or development of newly acquired property. Any such cost reductions or revenue increases would merely result in an equalizing adjustment to landing fee revenues to arrive at the predetermined "net income". Generally, the Audit Team found little evidence that operating costs were excessive. However, certain instances in which revenues may not have been maximized have been observed, and are discussed in another section of this report.

The Audit Team is recommending that the Department negotiate with the airlines for the purpose of amending the operating agreements to remove the disadvantage described above; namely, to remove or mitigate the provision that limits "net income" to a predetermined amount. One way of achieving this within the framework of the existing financial provisions of the operating agreements would be to negotiate an increase in the

existing landing fee minimum of 16 cents per 1000 pounds of certificated gross landing weight, which converts to \$6 million annually, to a level more consistent with the Department's current revenue and cost structure; and also to provide for periodic renegotiation of the minimum, perhaps every three years. The minimum should be at least sufficient to recover "airfield costs" and to generate an appropriate level of capital funds initially from operations. Once the landing fee minimum is achieved in any fiscal year, each additional dollar of non-airfield revenue generated results in an additional dollar of surplus funds that can be retained by the Department.

This effect is depicted graphically in Illustration No. 2 of the accompanying chart, which also assumes a \$7 million increase in non-airfield revenues. However, for purpose of illustration only, it is assumed that the minimum landing fee had been revised to 32¢/1000 pounds which converts to \$12 million in landing fees. Under these circumstances landing fees are not reduced below the minimum of \$12 million. Accordingly, the \$7 million increase in non-airfield revenue is offset by only a \$3.4 million reduction in landing fees. The Department retains the remaining \$3.6 million as additional surplus funds.

In this way, the Department by prudent and aggressive management could take steps to maximize revenues and minimize operating costs, and thereby significantly increase, perhaps by several million dollars annually, the amount of funds generated internally from operations. By using these funds as the Department's contribution toward grant funded projects, it may be possible to generate two or three times the base amount in total capital funds made available. To that extent heavy debt service on bond financing could be avoided.

There are also advantages to the airlines. The airlines will know that the Department of Airports will be motivated to maximize net income by maximizing revenues from all sources and minimizing costs. As long as the Department is achieving that level of net income required by the minimum landing fee rate, the airlines will know the landing fee rate they will be required to pay will not exceed the minimum, and that they will not be burdened with landing fee costs in excess of the agreed upon minimum. See Recommendation No. 12.

It must also be recognized that the airlines' goals are not fully synonymous with the Department of Airports' goals nor those of the City. A disparity of goals has become more apparent in recent years. The Department and the City are increasingly concerned with the total impact of the airports and their operations on the surrounding communities. Such considerations as the noise impact on the adjacent community and traffic congestion on the adjacent streets are of prime concern to the

City and the Department. In the future, the Department of Airports and the airlines should be expected to share a greater financial responsibility for offsite capital projects that are in part required by the airport's tremendous growth and activity. Implementation of Recommendation No. 12 will permit the Department to generate surplus funds that can be used for these purposes.

Since the majority of Department of Airports' operating agreements are effective until 1987 (some extend through 1992), the basic landing fee formula cannot be changed unless there is agreement among all involved airlines. The Board of Airport Commissioners has recently authorized three major design projects for critical facility improvements at LAX. Financing in the \$300 million range is immediately required to permit the construction of a second-level roadway above the present World Way and two new terminals, one for international carriers and one for domestic "short-haul" carriers. Before the Department could proceed with these improvements, it has been necessary to negotiate amendments to the existing agreements.

The City Council recently approved revised operating agreements which essentially continue all existing provisions and extend the duration of the agreements scheduled to end in 1987 to 1992. In return, the airlines have agreed to guarantee an additional \$185 million in revenue bonds. The \$185 million, coupled with the previously guaranteed but unissued \$70 million and some \$50 million in accumulated discretionary funds, will provide the required total amount.

Compounding the timing problem with regard to the issuance of new revenue bonds is the concern attending the passage of the so-called "Gann Initiative" which was approved by the electorate just this month. There will be a direct impact on the City's ability to issue revenue bonds. The City Attorney in a recent opinion on the subject has advanced the interpretation that proprietary departments in the future will not be able to rely on revenue bonds as a vehicle to finance capital development. However, the opinion is intentionally qualified because of the lack of specifics in the language of the Initiative.

There are essentially two questions which emerge from the Audit Team's review of the landing fee provisions of the operating agreements.

1. Should the existing agreements be perpetuated indefinitely in the best interests of the citizens of Los Angeles?

2. In view of the immediate financing requirements of the Department, is it reasonable to attempt to negotiate substantial changes to the operating agreements with the airlines at this time?

It is the view of this Office that the current agreements do not meet "best interest of the City" criteria, and should therefore not be continued indefinitely. The most appropriate course of action would involve a basic renegotiation of the agreements to allow landing fees to be determined by the Board of Airport Commissioners, based upon the cost of services being provided to the carriers plus a reasonable rate of return. The analogous concept is the "public utility rate setting" approach, such as now exists in Phoenix and Las Vegas, wherein rates charged reflect the cost of providing, maintaining and operating an airfield. However, acknowledging the time constraints mentioned above, the Department's proposal to extend the operating agreements to 1992 when all agreements will expire in order to finance the critical improvements identified is acceptable. Under no circumstances which may now be anticipated, however, should further extensions be made beyond 1992.

Financial Planning and Analysis

In 1969 the consulting firm of McKinsey & Co., Inc., in its survey of the Department of Airports stated:

DOA has demonstrated its ability to develop revenue historically and control their future development. However, it has planned revenue development informally rather than formally as the need for change occurred. The growing size, complexity and geographical dispersion of DOA's operations will probably exert growing pressure for a more formal planning effort... We believe DOA can strengthen its fiscal performance and financial posture by formalizing its plans for revenue development. While informal planning has worked well in the past, DOA's growing size and complexity as well as the huge financial burden it carries will place a premium on detailed formalized revenue planning.

In 1975, the consulting firm of Peat, Marwick, Mitchell & Co. recommended that a comprehensive financial plan be developed as part of a formal capital budgeting process, containing a program of required bond sales and indicating all sources and uses of funds for implementing the capital program. More specifically, the consultant recommended:

Incorporate into the format of the Capital Budget the major development programs of the Department as

they relate to development objectives to be established by the Board.

Establish a formal capital budget procedure, including annual preparation of the five year capital budget (based upon the program of Major Capital Projects) for review with and approval of the Board of Airport Commissioners.

Prepare an annual five year financial plan--to accompany the capital budget--relating to capital fund requirements identified in the capital budgeting process. Include as elements of the financial plan;

- Available fund balances
- Anticipated federal funding
- Estimated interest income
- Estimated required bond sales
- Estimated bond financing cost

In response to the latter consultant's recommendations, the Department indicated the belief that its financial planning efforts were adequate. The sound financial condition of the Department and its ability to raise large amounts of capital as required through bond sales has undoubtedly contributed to the fact that management is comfortable with informal financial planning. The financial arrangement with the airlines has obviously reinforced this conclusion. It is a tribute to the Department's top management that during a period of major growth and development they have been able to successfully operate in this manner.

Nevertheless, it may be that some of the problems the Department is now experiencing (for example, growth limitations at LAX or the annual costs in excess of revenues at the Palmdale facility), could have been more clearly foreseen, and perhaps mitigated if the Department had implemented more formal financial planning procedures. This could have been done if top management had decentralized and delegated financial planning along lines previously recommended by the consultants.

The need for more formal financial planning still exists and should be addressed. To be successful, the financial planning program should be guided by well-conceived policy statements of financial planning goals that should be approved by the Board of Airport Commissioners. The financial planning program can then be directed to achievement of the broad policy statements and also more specific goals that might be approved by the Board.

Some of the major areas of concern for which financial goals should be adopted are set forth in Recommendation No. 11. For example, is it the policy of the Board that each airport and facility should be self-supporting? See attached Exhibit III showing the comparative results of operations of the various airports and facilities in the Department. It will be seen that LAX is subsidizing the others.

If the Board determines that the goal should be that each airport and facility be made self-supporting, timetables for achievement should be established. By analyzing existing and potential sources of revenue including further development of existing properties, it may be determined that Van Nuys could be made self-supporting in a few years. Of course, this goal should not be achieved at the expense of systematic long-term planned development. Palmdale presents different problems. What is a realistic goal for the future of Palmdale? Once realistic goals are established, formal financial planning can commence. Management's attention would thereby be focused on achievement of the goal. The Board can effectively monitor results.

Another example of the need for financial planning can be found in the question, what is the policy of the Board regarding the amount of funds that can or should be generated internally from operations? This matter concerns the terms of the Department's operating agreements with the airlines and is the subject of Recommendation No. 13 of this Audit Report. It is recommended that the Department enter negotiations with the airlines for the purpose of amending the operating agreements to remove or mitigate the provision that limits "net income" to a pre-determined amount. One way of achieving this is to increase the 16¢ landing fee minimum incorporated in the operating agreement of 1967 to a level more consistent with the Department's current revenue and cost structure. Just what the level should be is not known to the Audit Team at this time. If the Board adopts the recommendation, the Department should carefully analyze and forecast its revenues and costs in order to determine a realistic minimum that is fair both to the Department and to the airlines.

The minimum fees established must give Department management a realistic incentive to take steps that will result in an increase in funds generated internally from operations. Formal financial planning and analysis will be required to make these determinations. Landing fees at LAX have ranged from a low of 16¢ per 1000 pounds in 1967 to a high of 52¢ in fiscal year 1975. Effective July 1978, LAX landing fees were reduced from 40¢ to 20¢ as a result of the Department's budgetary cuts made in response to Proposition 13. The fees are now at the minimum level of 16¢. By way of comparison it is noted that 16¢ is among lowest landing fees at any major airport in the country. (AOCI

report dated April 1977). See Exhibit IV for more details on landing fee data at LAX and at other major hub airports.

It is also being recommended that the Board consider adopting a policy that will restructure landing fees by imposing peak hour surcharges in order to discourage peak hour landings and thereby redistribute some landing operations to non-peak hours. In addition to alleviating pedestrian and traffic congestion at the peak hours, it could also have other beneficial results. Such a policy could increase total maximum capacity at the existing airport facility. It would also increase total revenues to the airport concessionaires, since, in theory, they would be operating closer to maximum capacity around the clock and throughout the week. This would eventually increase the revenue to the Department, which, in turn, could result in reduced landing fees and/or increases in funds generated internally from operations. The impact and ramifications of such a policy are an appropriate subject for formal financial planning and analysis.

In a large complex organizational environment such as the Department of Airports, potential benefits from formal financial planning and analysis are great indeed; not only in connection with those issues itemized in Recommendation No. 11, but with other issues that surely exist now and which will arise in the future.

ACCOUNTING

General Accounting

The Accounting Bureau is comprised of the General Accounting, Revenue and Investment, Auditing, Purchasing and Data Processing Sections.

A complete double entry general ledger is maintained on a commercial accounting basis for the Airport Revenue Fund and several special and bond funds. The activities of the Accounting Bureau are generally well administered. Many accounting activities are supported by modern data processing applications. Periodic budgetary, financial, and management information reports are prepared throughout the year. The books and records are subjected to a complete audit annually as a basis for the preparation and distribution of the annual audited financial statements.

Airlines' representatives follow the Department's cost accounting and financial reports closely, because of the financial arrangements that exist between the airlines and the Department in the operating agreements and the cost recovery formula in the airline terminal leases. The Chairman of the Airport Affairs Committee, which represents the scheduled airlines, expressed the opinion to the Audit Team that the Department's accounting records and reports are excellent.

However, opportunities for improved accounting do exist and are generally being pursued by Accounting Bureau personnel. The Data Processing Section is working on a program to automate the posting to the general ledger. Some effort has been made to convert interim reports to an accrual basis. This effort has not been completely successful because of the need to retain compatibility with the City's basic appropriation system. Procedures for billing, collecting, and recording revenues in accordance with terms of several hundred leases and contracts are partially automated and partially manual. Further automation of these procedures appears feasible, possibly to interface with the lease renewal system.

Cost Accounting

One area of concern, expressed in interviews and observed in examination of records during the course of the audit, is the complexity of the accounting system's chart of accounts. The existing chart of accounts, particularly the cost accounts, has grown to meet the increasing complexity of the

Department's organizational structure, facilities, and numerous cost recovery type leases. Account codes have evolved into at least a five-dimensional system, i.e., cost center, function, activity, object, and program. While all these cost classifications have been developed to provide needed information, it appears that the existing system is overly complex.

The procedures for developing maintenance and operations charges to provide a basis for escalation of the cost recovery portion of the numerous leases is also detailed and complex. Although the airlines' representative stated that they are very satisfied with the existing procedures, it would appear that these procedures could be simplified.

The existing accounting system does produce routine reports which show revenues, costs and net income by each airport. Also, considerable detailed information is available on revenues received and costs incurred within each airport. However, there is no practical way to routinely determine which of the several hundred leased facilities and land areas contributed to net income and which detracted from it. Routine internal reports showing profitability of each of the facilities would be extremely useful to management. Those facilities or land areas which are not satisfactorily contributing to net income would be identified and could be studied to determine what corrective action might be taken.

The Accounting Division has in the past initiated some effort to develop a new chart of accounts but those efforts have not been sustained. A new chart of accounts should be devised to correct some of the existing ambiguities, and to provide a framework so the accounting system may accommodate the future growth of the Department of Airports, or possible evolution of the Department into a regional airport authority. The new cost accounts structure should provide for a coding system that would facilitate establishing primary and secondary cost centers as required to accumulate cost by major facilities, and to the extent feasible, for each lease or revenue producing source therein. The ideal objective would be the routine preparation of internal management reports showing the profitability of each facility or lease.

A committee comprised of accounting, data processing, and appropriate line management personnel should be established for this purpose. Steps should be taken to assure that committee members are required to devote sufficient time to sustain the effort. The committee should determine the extent to which the advice and guidance of one or more qualified consultants may be required. See Recommendation No. 13.

Reimbursement to the City for Cost of Services Provided

Under the provisions of Charter Section 239.8, the Airport Revenue Fund is specifically exempt from Charter Section 382. Accordingly, the Mayor and Council have no authority to direct by ordinance that surplus funds be transferred to the General Fund. The Master Bond Resolution also prohibits transfers from surplus as a protection to the bondholders. No such restriction exists against reimbursement of operating expenses or capital costs incurred by City departments in providing services to the Department of Airports.

The Department has for several years reimbursed the General Fund for the cost of services provided by other City Departments. In the 1977-78 Fiscal Year, the Department reimbursed the City's General Fund \$3,200,000 for the costs of crash and rescue service provided by the Fire Department and for administrative services provided by the Controller, Treasurer and Personnel Department. It has agreed to reimburse the City a similar amount for the next two years, after which time the amount will be adjusted based on actual costs incurred.

From June 30, 1966 through June 30, 1978, the Department has reimbursed the City's General Fund a total of \$11,250,000 in repayment of the City's original investment in the Airport. The balance of \$3,597,175, will be reimbursed at the rate of \$1,000,000 per year until fully paid.

Currently, 36 LAPD personnel are assigned to provide patrol of the public areas at LAX for which no cost reimbursement is made. Future reimbursement to the City should include the costs of LAPD personnel currently assigned, and also any additional personnel that may be assigned in the future.

The City's General Fund has incurred in the past and continues to incur considerable capital and operational costs to install and maintain offsite projects in the airport area that are required in part by LAX's tremendous growth and activity. In the future, the Department of Airports should be expected to share the financial burden of such offsite costs as street development, street maintenance, traffic signalization, street lighting, sewers, etc., insofar as these facilities are fully or partly required by LAX. Such expenditures by the Department of Airports would be authorized under Section 239.8B of the City Charter. See Recommendation No. 11e.

LAX PARKING OPERATIONS

Public pay parking operations represent the largest source of non-airfield revenue for the Department and the second largest single source of operating revenue (after landing fees). To facilitate the review of this large scale activity, the Audit Team addressed the administration of parking from the perspective of the Department as airport operator.

The parking function is under contract with a parking operator who is primarily responsible for supplying labor to make collections at parking lot cashier booths. The mechanical equipment and operational procedures for airport parking is the responsibility of the Department of Airports.

Gross operating revenue from Department parking operations was about \$18 million for 1978. LAX parking alone contributed about \$16 million. Approximately eight million autos used the 19,000 spaces located in public lots. One out of every four airline passengers used public parking facilities. Also 95% of the total parkers at LAX used Central Terminal Parking Lots.

Revenue Losses

Although a foolproof system has not yet been devised to prevent all parking revenue losses, current parking operations are not only resulting in less than adequate service to airline passengers and airport employees, but are actually experiencing an estimated annual gross revenue loss of 1 million dollars. These losses are attributed to several factors, discussed below.

Faulty Equipment

The Audit Team observed faulty equipment in ticket issuing and ticket payment operations. The large number of supposedly "lost" tickets and the uncontrollable amount of "legally" voided tickets invite ticket substitutions to escape high parking charges. The lack of mechanical calculation of parking fees, and the inability of cashiers to check lists of names for free parking or lists of license numbers for long term parkers during rush periods causes errors.

The Audit Team believes that state of the art technology is available to improve outdated equipment and operational procedures existing in the current DOA parking system. The card key control system and the automated fee calculation system installed at the World Trade Center, Los Angeles is an example of the type of improved parking control systems which should be

evaluated by the Department for possible replacement of the current LAX system.

Lost Parking Tickets

A Department survey indicates that 1.5 percent of the 687,000 parking tickets issued per month are lost (10,000 per month). Parking reports do not systematically tabulate the number of lost tickets, so the actual number currently lost is not known. The Department accepts the word of the parking customer regarding time spent in the parking lot and charges accordingly. People who lose their tickets are required to fill out a card, indicating name, address, driver's license number and auto license number. They may be charged considerably less than the amount due if the actual parking time were known. Revenue losses due to lost tickets could be as much as several hundred thousand dollars annually. The numerous lost tickets also make it difficult to establish adequate revenue control.

The Department has implemented procedures to alleviate some of the parking revenue losses. An inventory is made of autos in the Central Terminal Area parking lots after midnight, and a list is kept of long-term parkers so that their charges can be more adequately assessed if their tickets are lost.

As another step toward eliminating ticket losses, a test should be conducted in which parking tickets are required to be left in automobiles to prevent their loss. A similar practice is used at UCLA where the parking ticket must be visibly displayed on the inside windshield. Department inventory personnel could place a new substitute ticket on those auto windshields where a ticket is not visible. Such an improvement should eliminate the majority of lost tickets. In addition, the Department should provide appropriate signs and tape recorded voice instructions at each ticket dispenser requesting the visible display of parking tickets on windshields, and advising parkers of a maximum daily lot charge to be imposed for any lost ticket. See Recommendation No. 16.

Voided Parking Tickets

About four percent, or 27,000 per month, of the parking tickets issued at LAX are voided by the cashiers for various reasons, including Department security and maintenance personnel driving through parking lots; free parking privileges daily for about 700 to 800 people working at the airport, such as customs and immigration employees, airline management employees, contracting employees; and any auto in the lot for less than six minutes.

The processing of legally voided tickets requires only that the driver of the auto sign his or her identification on the back of the parking ticket, or have it previously stamped by an authorized validation source at the airport, such as Customs.

We believe that the large number of voided tickets creates additional administrative work, promotes illegal ticket use, and makes it impossible to establish adequate parking and revenue controls. The number of voided tickets could be greatly reduced by the implementation of a card key system for security and maintenance personnel and for free parkers. See Recommendation No. 17.

Airport Employee Parking

Airport employees take up considerable parking space in public parking lots. Currently, 700 to 800 airline employees, various governmental employees, and Department of Airport employees receive daily free parking privileges in World Way parking lots. In addition, the Audit Team noted many other employees of different airport concessionaires paying for their parking. The exact level of employee usage of airport parking is not known, because the Department has not sought out the information, but studies on airport parking point out the impact of employee parking at airports. A recent economic publication released by a local bank states that "Employment at LAX is estimated at about 40,000, of which about three-quarters are with air carriers and one quarter with concessions, ground transportation and airline service companies and government agencies."

De Neufville in his "Airport Systems Planning", issued in 1976, states that "Studies have repeatedly shown that congestion in airport access at the rush hour is predominantly caused by airport and airline employees; they may then constitute up to 80 percent of the airport traffic." Further, "Employees, who can account for half of the total parking space on the airport, can be stimulated to use remote lots..."

Priority for critical parking spaces should go to meeting needs of air passengers and not airport employees. An incentive should be provided to encourage more employees to park outside of the CTA in outlying parking lots thus freeing the critical parking space for the traveling public. See Recommendation No. 18.

Improved Parking Lot Statistical Reporting

Through analysis of airport parking statistics the Department should be able to ascertain the magnitude of revenue losses due to lost tickets. It was noted by the Audit Team,

though, that the current statistical reports do not indicate the number of lost tickets by parking lot. Based on a survey made several years ago, the number of lost tickets is estimated at 1.5 percent of all parking tickets issued. In order that management may be currently informed, the number of lost tickets should be entered on all daily logs for each parking lot.

Attention should also be given to collecting data on long term parkers in the Central Terminal Area. A recent Department study indicates that 80% of the parkers using Central Terminal Area parking lots stayed under two hours. Although only 6% of the parkers used the lots for over 12 hours, their cars occupied over half the space, greatly diminishing the number of spaces available for short term parkers. (Since the audit field work was completed, the Department has increased parking fees in the CTA for long term parkers. This change may well impact these statistics.)

The daily statistical record maintained by each parking lot cashier does not provide any detail on those parkers using the lot for more than 12 hours, but combines all long-term parkers using lots more than 12 hours into a single category. The current system accounts for the number and the dollars for each parker in each two-hour segment up to 12 hours. See Recommendation No. 21.

Direction Signs to Parking Lots VSP and C

Even though considerable media publicity has been provided on the advantages of using the outlying VSP and C parking lots at LAX, directional signs leading to these lots are not readily noticeable or, in many cases, non-existent. Improved directional signs are needed along the freeways and City streets to guide airport patrons to the outlying VSP and C parking lots, and to assure patrons that bus transportation to the terminals is available.

Since many airport users are not familiar with the airport environment, they require all possible assistance in locating these outlying parking lots. The use of temporary flashing light signs for peak periods and seasons should be encouraged. See Recommendation No. 19.

Bus and Tram Stops

Current practice along World Way is for bus and tram drivers to announce stopping places in front of terminals. Some drivers are less thorough than others in announcing airline terminals, and as a result, passengers on occasion have boarded the wrong bus or failed to get off at the right stop. Flyaway bus and trams should be arrayed with signs which depict the

location of and the specific airlines situated near each stop. Also, the same information should be printed and made available to passengers. See Recommendation No. 20.

Improved Security for Outlying Parking Lots

The Police Department indicates that there are more auto break-ins and other crimes occurring in the outlying Parking Lots C and VSP than the parking lots along World Way. The low fences surrounding Parking Lots C and VSP are inadequate since they allow unrestricted access to the parking area. The use of lookout towers for both manual and television surveillance, and improved fencing to preclude unrestricted access should be considered to improve security and encourage greater use of these outlying lots. See Recommendation No. 22.

Airport Parking Coordinator

Coordinating and monitoring parking operations in the Department of Airports has been a part-time duty for an administrative staff position presently assigned to the office of the First Deputy General Manager.

The task of guiding the large parking system of over 21,000 public parking spaces at the three Department airports, in addition to airport employee parking, is sizable and requires the efforts of a full-time person.

A full-time Parking Coordinator should be appointed to plan and recommend improvements in the airport parking system. The coordinator should administer the airport employee parking system as well as the courtesy parking operations. Monitoring operations of the Parking Operator should also be part of the job. Examination of successful parking operations already existing should be stressed. See Recommendation No. 15.

AIRPORT OPERATIONS

Using policy guidelines established by the Board of Airport Commissioners and the General Manager, the First Deputy General Manager Airports-Operations, supervises the three airport managers who are in charge of the day-to-day operations at the LAX, Ontario, and Van Nuys Airports.

Of the three airport managers, the LAX manager is in charge of the largest organizational grouping which consists of the Operations Section, and the Maintenance, Security and Airport Boarding Services Divisions.

Operations Section

The Operations Section enforces or assists in enforcing operating rules, regulations, and procedures for the safe and efficient operation of LAX facilities and equipment.

The Section's work is primarily carried out by Superintendents of Operations who are normally in charge of airport operations during an eight-hour tour of duty which may be scheduled on any shift. During nights, weekends, and holidays (comprising some 78% of the total worktime), Superintendents of Operations are in complete charge of airport operations and deal with all manner of contingencies.

Even though their responsibilities are extensive, some of the more typical duties of the Superintendents are: patrolling and inspecting airport facilities, including runways, taxiways, landing lights and taking corrective action when hazardous conditions exist; coordinating operations with field maintenance personnel, Police and Fire Departments, Federal agencies and airport tenants; conferring with representatives of governmental agencies, airlines, tenants, and other organizations concerning use of airport facilities, regulation of airport traffic and aircraft parking; managing activities and gate assignments at the International facilities at Satellite 2; issuing movie permits; arranging for major VIP visits, and assisting in the review of basic operating agreements at LAX.

Staffing of the Section consists of a Chief of Operations, eight Superintendents of Operations, an Administrative Assistant and a Clerk Stenographer.

Prior to July 1977, the operations and security functions were an integral unit called the Operations and Security Bureau. The Audit Team was told that Operations and Security functions were separated at that time into two

organizations without the knowledge and participation of the Division head, the Assistant Airport Manager LAX, Operations and Security; and his position title was changed to Chief of Operations at a reduced salary. The Civil Service examination for Superintendent of Operations was changed to eliminate the requirement for previous flight experience. The salary parity between the Operations Section and Maintenance Division has changed to favor Maintenance. Problems are occurring between the Security Division, Maintenance Division, and the Operations Section over inadequate responsiveness exhibited by Security or Maintenance personnel in carrying out orders of Superintendents of Operations.

The Chief of Operations and six of the eight Superintendents are previous pilots. They stated that considerable on-the-job training is necessary to familiarize a person who has no previous flight operation experience. Also, because of the workload, Superintendents have limited time available to train new appointees.

The "Risk Exposure Determination and Measurement Study" prepared by consultants Warren, McVeight and Griffen, released in December 1977, brought out the fact that an airliner crash for which the Department could be liable could amount to many millions of dollars. It states: "The care and maintenance of the runway involves a serious exposure to not only property damage but also bodily injury. Failure to properly maintain runways or to keep animals or people off runways could result in an airliner crash. The ingestion of foreign material into an aircraft's engine just at the point of takeoff could cause a crash." If such foreign material were the result of the airport's negligence, the Department conceivably could be held liable for the crash and the resulting injuries and damages. With a risk potential so great, a misguided decision made by a Superintendent of Operations could be disastrous. A specific reevaluation of the requirements for this class should be made.

Because of their specialized knowledge of LAX operations, the Operations Section personnel spend considerable time analyzing, recommending and drafting implementation procedures for a considerable number of items, including new or revised airline operating agreements, the Airport Operations Manual, the Airport Emergency Manual, FAA Regulations, and resolutions from the Board of Airport Commissioners.

The amount of such administrative staff work has greatly increased over the last few years, and has involved an increasing amount of time of the Chief of Operations and most of the Superintendents. As a result, supervision is suffering, morale is low, and a considerable amount of work is overdue; for example, the Operation Manual is out of date and very little

progress has been accomplished since the revision effort began in 1976. Over 400 copies of the Manual are distributed and it contains a compendium of existing airport regulations and procedures to comply with FAA Post 139 pertaining to airport certification requirements. Formal changes have not been made to the Manual since it was issued in 1972.

Consideration should be given to assigning administrative staff work of the type performed in this unit to the Management Services unit recommended in the Organization section of this report. The Superintendents would be relieved of these studies and other administrative tasks which take up much of their time at the expense of a reduced airfield surveillance program.

International flight operations at Satellite 2 have increased so much that consideration should be given to providing additional assistance in managing this operation. At present there is no coverage during the day Saturday and Sunday and after 10:30 p.m. throughout the week.

There is no Department program aimed at providing first-hand opportunities to Superintendents to observe the operations of other large airports in order to improve those at LAX. Exchange visits for this purpose were held between LAX and New York some years ago. Renewal of this type of program would provide assurances that LAX operational practices are current and consistent with those of other major airports.

There appears to be good opportunity for improved communications between Department management and the staff of the Operations Section. At the time of the audit, we observed a definite morale problem apparently arising from a feeling that top management does not understand the functions and responsibilities of the Operations Bureau, and that the organizational role of the unit has diminished in importance. There is a very noticeable lack of support for the organizational changes which were described above. See Recommendation No. 23.

AIRPORT SECURITY

The three major organizations responsible for security and policing of LAX are the Department Security Division (111 positions), the Department Airport Boarding Services Division (72 positions), and Los Angeles Police Department LAX operation (36 positions).

Escalating passenger growth, the backup need for the extensive staff capabilities of the Los Angeles Police Department (LAPD), terrorism, increased risk exposure by security forces, and overlapping inefficient policing operations caused by dividing the responsibility among three different organizations, necessitate a restructuring of security operations at Los Angeles International Airport. The heavy reliance on the continued use of "security guard" type operations at LAX is inadequate to cope with the diverse law enforcement problems emerging at the airport.

Security Division

The Security Division is the primary, full-time force charged with overall Airport security, which involves enforcement of all rules and regulations covering general security on LAX property and vehicle traffic control in restricted field areas. Enforcement responsibilities are carried out by vehicle patrols, foot patrols, and fixed security posts in coordination with other law enforcement agencies such as the LAPD, FBI, and tenant security forces. Because of the nature of its duties, deployment and 24-hour availability, the Security Division assumes the initial responsibility for action and coordination in security matters brought to its attention by Airport users and the public.

Security personnel are called Special Officers. They are peace officers as defined in Section 830.4 of the Penal Code of California. They are armed and have uniforms similar to those worn by the Los Angeles County Sheriff Department personnel. The officers are deployed daily to perform the following activities:

1. Control of vehicular traffic on World Way. This includes citing and impounding vehicles violating the no parking areas in front of the terminals but excludes enforcement of moving violations. Three-wheel motorcycles are used to supplement the foot patrols.
2. Patrol and enforcement of vehicular traffic on the airfield service roads with two vehicular patrols which enforce driving rules and regulations on airfield

service roads, look for trespassers, survey fence lines, and provide field escort service.

3. Vehicular patrol of World Way parking lots and structures. Outlying parking lot C and the VSP and employee parking lots operated by tenants are also patrolled.
4. Foot patrol of satellites and terminals. Doors leading to restricted areas are checked.
5. Vehicular patrols of Department property in the Westchester area.
6. Administering the issuance of identification badges and vehicle operator passes to LAX tenants.
7. Enforcement of rules on unauthorized taxis and limousines soliciting at LAX.
8. Preparing reports on personal injuries and property damage occurring on LAX property.
9. Making arrests as required.
10. Fulfilling fixed post assignments.

The traffic control responsibility on World Way is the major function of the Security Division, and, according to the Special Officers, creates the biggest problem. Only the LAPD Officers can issue moving violations on World Way. The Special Officers are authorized to issue parking citations only. Many Special Officers indicate they need the authority to issue citations for excessive speed, jay walking, starting or backing when unsafe, and reckless driving. Some Special Officers indicate that civilian Traffic Officers similar to those employed in the LAPD could do the job of controlling traffic at LAX.

The Special Officers have expressed the need to be more closely identified with the "policing" function instead of with their "security" role. The claim is made that the current uniforms are not distinctive as police uniforms, looking more like security guard uniforms. There are many uniformed people in the traffic areas, a factor which may create the impression that few, if any, are actually peace officers. LAPD officers on World Way usually gain much more respect from the public in resolving problems. Reportedly, the biggest arrest statistic is "assault on an officer" because the public does not acknowledge that Special Officers can make arrests.

The Airport Chief Special Officer states that the responsibilities of the Security Division are not clearly defined. Although the Special Officers are peace officers, the extent of their authority is not specified, and it is unclear to the officers how far they may go in the enforcement of the law at LAX. There is a controversy over whether LAPD or Airport Security has the authority for making arrests at the Airport. Special Officers have indicated that morale in the Division is low because of this unclear definition of responsibilities, and because training is inadequate for their job, as discussed later in this section of the report.

Boarding Services

The Airport Boarding Services Division is responsible for providing law enforcement support for airline passenger screening activities, as described in Federal Aviation Regulation (FAR) 107, which prescribes security rules for operators of airports regularly serving scheduled air carriers; and in FR 121, which requires certificated airlines to have a security program covering aircraft access, screening of passengers, and baggage and cargo handling. At least one law enforcement officer must be present throughout the entire passenger screening process prior to boarding for each flight conducted by a certificated holder required to have a security program under FAR 121.538 and for each foreign air carrier that requests such law enforcement support.

A law enforcement officer means "...an armed person authorized to carry and use firearms, vested with a police power of arrest under Federal, State, or other political subdivision authority, identifiable by uniform, badge, or other indicia of authority, and assigned the duty of providing law enforcement support in preboard screening aspects of security programs filed by certificate holders and foreign air carriers requesting such support".

In 1977, Boarding Services officers made 319 arrests, and Security Division Officers made 176 arrests. Boarding Services officers are required to obtain supervisor approval to insure that adequate evidence exists to justify the arrest. Security Division officers are not required to obtain such approval.

Screening operations are conducted at ticketing terminals 2, 3, 4, 5, 6, and Commuters 6 and 7. The West Imperial Terminal has prescreening operations when charter flights leave that terminal. These eight operations are manned around the clock on three watches, except that Commuters 6 and 7 are not manned during late night and early morning hours.

Because Special Officers in the Security Division are not allowed to provide relief in the Board Services function, a pool of Boarding Services officers ranging from three to sometimes 10 per shift is maintained for relief, lunch, and the back-up manning of screening stations when arrests are made. A minimum of four pool officers are deployed on the day and p.m. watches and three pool officers on the a.m. watch. Officers on overtime are required if these minimums cannot be maintained. Usually there are many more than the minimums in the pool on all watches. Retaining this pool of officers only for relief purposes is costly -- estimated at several hundred thousands dollars annually.

Turnover is a major problem in the Division. Up to 20 new officers join the organization every six months. Every new boarding officer is required to participate in a two-week training course. The course consists of 20 hours of general aviation security requirements taught by the FAA inspector, and 40 hours of laws of arrest and firearms taught by the local FBI.

An overwhelming number of officers stated that current training practices are inadequate to properly equip them to handle the security problems at LAX. Very little training is provided outside the two weeks basic training provided to Security Division and Boarding Services officers. Officers revealed deficiencies in understanding legal implications in carrying out their job, laws of arrest, search and seizure, hand combat and defense, and how to deal with LAX visitors.

In order to correct problems in both the Security Division and the Boarding Services Division, the following changes are recommended:

1. Consolidate the Boarding Services Division and the Security Division into one organization. Through this single structure make the following adjustments to personnel practices:
 - a. Provide an enhanced peace officer training program for all security personnel, and cross train them so that those assigned to Security Division can perform the work of Boarding Services and vice versa, thus removing the need to maintain a costly relief pool.
 - b. Provide all security personnel, both Boarding Services and Security Division, with the same uniform so that new uniforms need not be purchased if personnel are transferred.

- c. Reduce the use of overtime by utilizing the greater flexibility of assignment in the combined force.
- d. Establish a uniform practice of supervisor review of arrests made by security personnel.

The possibility exists that lawsuits could result if an officer mishandles an incident with the public, or an officer may sue the Department for injury sustained because of inadequate training.

Los Angeles Police Department

LAPD maintains a 36 person staff at the LAX Police substation. Originally, the LAPD patrolled the public areas and LAX Security patrolled the security areas. In September, 1974, the World Way traffic function was transferred from LAPD to LAX Security, however, the authority to enforce moving violations on World Way remained exclusively with LAPD.

There is overlap in coverage between LAPD and LAX Security in the public area, primarily in the parking lot and parking structure patrol. There are four or five LAPD officers, day and night, on parking structure and terminal patrol. This is in addition to several full time LAPD plain clothes officer patrols. Security Division also deploys full time patrols in several parking structures, Lot C and VSP lots. Many times both LAPD and LAX security officers respond to the same occurrence.

If an arrest is made, the suspect is taken to the LAX Substation for initial booking procedures and questioning. Then, if the arrest is a felony, a LAPD officer has to accompany the arrestee and the Security Officer to either Venice or Van Nuys for the final booking. The LAPD is usually required to assist in the arrest report preparation, which involves a considerable amount of time.

The LAPD has prepared a feasibility study on the subject of unified command of the entire LAX policing and security functions. Although the results of this study have not been published, it is our understanding that it makes a favorable case for consolidating the functions under the Police Department.

This Office strongly supports the concept of unified command in place of the now separate policing and security functions at LAX to eliminate current operational problems and costly duplication. The Department should further pursue the feasibility of the concept with assistance from the Police Department. See Recommendation No. 24.

LAPD management indicates that Traffic Officers (which are scheduled to be transferred from LAPD to the newly formed Department of Transportation on January 1, 1980) could provide adequate control of the vehicular traffic problem at LAX at a much lower cost than Special Officers. Transfer of LAX traffic control from LAX to the Department of Transportation should be considered. See Recommendation No. 25.

MAINTENANCE DIVISION

Materials Management

The Maintenance Division performs required maintenance work to keep Department facilities operating 24 hours a day, seven days week. Replacement parts, lubricants, paint, asphalt and concrete products, custodial supplies and other necessary materials must be available when needed in order to accomplish this mission. Due to the size of the Maintenance Division and the scope of its work, a majority of the activities of the Purchasing Section of the Accounting Division are geared to supporting maintenance operations.

The maintenance functions include field maintenance, custodial services, and the maintenance and repair of buildings, equipment, and utility systems. The procurement, storage, distribution, and the charging of materials to departmental account numbers is handled in conventional fashion for the field maintenance and custodial services activities. A different system is used to supply repair parts and other materials to personnel working out of the electrical, plumbing, air conditioning, and elevator and escalator craft shops because the Department's central warehouse is of limited size, is open only five days a week during the day shift, and is located about one-half mile away from the maintenance yard. Although some of the parts and materials are kept in the Department's central warehouse until they are used by craft personnel on the job, due to the nature of the work and the hours of operation (two and three shifts, seven days a week in some craft shops), a "working inventory" of regularly used parts and materials is also kept on hand in the various maintenance and repair shops.

Under the present system, it is difficult to accurately charge all parts and materials to departmental account numbers. In addition, no formalized inventory control systems are used to keep track of the materials in the craft storerooms, and no storekeeping personnel are employed to check the materials in or out except in the vehicle repair and service area. The Maintenance Division has been criticized by the City Controller's Office because of the deviations from traditional material management practices described above. The Controller has recommended that a separate warehouse be put into operation in the maintenance yard where all materials and supplies can be secured and issued as needed, and so that the material costs can be properly accounted for. There is no consensus of opinion on this matter among the concerned Department personnel, however.

Some personnel, including many of the craft supervisors, believe that the current system, whereby many required parts and materials are readily at hand in craft storerooms, provides the best materials support for airport operations. A 1978 Department staff report stated: "...the nature of airport operations would make a rigid control costly and impractical. Stand-by materials and equipment are required by maintenance personnel to meet immediate needs. The final cost in terms of additional labor may outweigh the savings from a more controlled inventory procedure."

It is interesting to note that one of the recommendations made in the Touche-Ross Company's Materials Management Study for the City essentially coincides with the current method of operation at the Department of Airports. In this situation, automotive parts and other materials are to be distributed from a central warehouse to the 33 satellite garages operated by two separate departments. Each satellite garage has a stockroom and currently there are many storekeeping personnel assigned to these garages to receive, store and issue the material to users and to keep inventory records. The consultant's recommended means of handling the distribution of these materials is as follows:

Materials drawn from the central warehouse will be considered as issued to or used by the departments. As the result, the materials housed at each garage will no longer be considered as booked inventory under fund control, thus eliminating the need for detailed inventory or stock control at these locations. Instead, control of inventory will rest with the repair supervisor at each location. This arrangement should result in substantial cost savings to the City through personnel reductions.

Other management personnel at DOA, including the Chief Accountant, believe that a central warehouse should be built in the maintenance yard, and the operation of the craft storerooms be discontinued. However, a new larger warehouse would be costly to build, and because of the 2 and 3 shift operation of several of the crafts, a number of additional personnel would be required to staff it to support the Maintenance Division. To our knowledge, no cost-benefit analysis has been performed to determine the trade-offs involved.

Before a decision is made to construct a new central warehouse in the maintenance yard, it is recommended that a thorough cost-benefit analysis be made to determine its feasibility--taking into account both the service and cost aspects of such a proposal. It is further recommended that during the course of this analysis, Department personnel contact personnel involved with implementation of the City's Materials

Management Program to determine the feasibility of consolidating some warehousing operations in this area of the City. See Recommendation No. 27.

Regardless of whether or not it is decided to build a new central warehouse, there are a number of improvements which should be made in existing materials management procedures. Discussions with personnel from both the Maintenance Division and the Purchasing Section indicated that some operating problems currently exist between the two organizations. One relates to the inventory levels to be maintained on certain stock items in the central warehouse. Reportedly, for some items the levels are too high and for some they are too low. It also appears that the central warehouse should stock certain items for the Maintenance Division which are not presently stocked. Because the warehouse does not stock certain items and because not enough yearly orders are used, personnel in the Maintenance Division sometimes spend excessive time in the procurement of materials. This work should be handled by the Purchasing Section to the greatest extent possible.

It is believed that most of the problems between these two organizations can be solved through improved communications and a better understanding of the specific needs of the Maintenance Division. Therefore it is recommended that representatives from Maintenance and Purchasing investigate problem areas and implement improved materials management procedures for LAX, Ontario, and Van Nuys Airports. Suggested areas for joint investigation would be to:

- * Determine, on the basis of current operations and materials usage, which items should be stocked in the central warehouse, and the proper inventory levels to maintain for each item in the central warehouse and in the craft storerooms.
- * Determine which additional items should be handled under yearly orders to facilitate procurement.
- * Review purchase requisitions prepared by craft supervisors during the past year and arrange for all periodically recurring materials procurement to be handled by the Department Purchasing Officer in the future.
- * Analyze current central warehouse stock, get rid of slow moving items and make room for new high volume items not now stocked.

- * Review craft storeroom security in each craft shop area and implement additional security measures as appropriate.
- * Develop a system for making inventory control test checks to assist craft supervisors in establishing more positive control over their inventories. See Recommendation No. 28.

It is also recommended that personnel from the Accounting and Maintenance Divisions jointly review the present method of apportioning material costs for maintenance work with a view towards improving the accuracy of the charges. See Recommendation No. 29.

Ontario Airport Maintenance

Maintenance work at the Ontario Airport is performed by personnel from the Department of Airports Maintenance Division at LAX and by Ontario based maintenance personnel who report directly to the Manager of Ontario Airport. The Audit Team believes there is a need for improved coordination and communication between the Maintenance Division and the Manager of the Ontario Airport, so that all concerned will know exactly what needs to be done, by whom, and when the work is scheduled to be performed. Some coordination and communication presently occurs; however, in our opinion it is not sufficient.

There has been an increase in the number of facilities being maintained at Ontario within the past year, and further expansion is planned. Reportedly, there are insufficient personnel available to perform all maintenance work, including preventive maintenance, on a timely basis. To meet this problem, the Audit Team recommends that a Maintenance Workload Analysis be prepared at least once each year prior to budget decision making. See Recommendation No. 26a.

The number of hours required in each craft area should be determined. The amount of time to be spent at Ontario by LAX personnel should then be adjusted accordingly, and a determination should be made as to whether additional craft personnel should be based at Ontario.

Cost-benefit analyses should be conducted to determine in which craft areas it would be more economical to use contractors at Ontario in place of additional Department of Airports employees. The travel time between LAX and Ontario is considerable, and as a result the number of productive craft hours is minimized. The use of more contractors appears desirable.

Formal and comprehensive inspections of all airport-owned buildings and facilities at Ontario are not now made by craft supervisors from the Maintenance Division. Although craft supervisors do visit Ontario Airport from time to time, this is not done on a scheduled basis, and no formal inspection reports are prepared by them.

It is recognized that the Airport Maintenance Supervisor at Ontario is now making some inspections (including the FAA required monthly field inspections), but the Audit Team believes that the Maintenance Division craft supervisors possess a level of expertise that should enable them to identify problems which might otherwise go unnoticed. The value of the Department's preventive maintenance program is also acknowledged, but this does not eliminate the need for a systematic inspection program by craft supervisors.

The Audit Team suggests that formal documented inspections of the buildings and facilities at the Ontario Airport should be made by each of the craft supervisors at predetermined intervals. The Maintenance Supervisor for the Ontario Airport should accompany the craft supervisors on such inspections. All buildings and equipment, including buildings which have been leased to tenants, should be thoroughly inspected.

It is strongly recommended that an inspection report form be developed for documenting the inspections. A separate inspection report should be completed for each building or area by each craft supervisor. The supervisor would enter a description of needed work and his assessment of the priority (urgent, routine, etc.) at the time of the inspection. Later, the craft supervisors, in conjunction with Maintenance Division management, would enter on the form who should perform the work (Maintenance Division, Ontario, tenant, or a private contractor paid by the Maintenance Division). If the work is to be performed by the Maintenance Division or private contractor, a tentative date for the work to begin should be included if possible. Work order numbers should be entered.

The inspection reports would then be duplicated and copies sent to the Ontario Airport Manager and Maintenance Supervisor so that all parties involved would know what needs to be done and what is planned to accomplish the needed work. When work is completed, that information should be communicated also.

This information should be of great assistance to the Airport Manager in carrying out his responsibilities and making certain that needed work is performed by the proper persons in a timely manner. It would serve as the basis for requests to

tenants to take corrective action where the work is their responsibility under a lease.

When work orders not generated by formal inspections are issued by the Maintenance Division, copies should be sent immediately to the Ontario Airport so that this information can be entered on appropriate control forms and the Airport Manager and Maintenance Supervisor will thus have up-to-date control sheets to let them know what work is planned. See Recommendation No. 26b.

The Audit Team believes that the Maintenance Division should also consider applying a formal documented inspection approach by craft supervisors to LAX and Van Nuys Airports. Although it may be less critical at LAX because of the daily presence of the craft supervisors at that location, and the informal inspections which they now make, it would still serve a very useful purpose. It would assure that all buildings and areas have been inspected on a systematic, thorough and regular basis, and it would provide Department management with a control tool to readily assess whether needed work is being performed on a timely basis or whether there are backlogs or other problems. See Recommendation No. 26c.

The work of the Maintenance Division is of high quality and is generally performed on a timely and efficient basis. However, control of the work is handled in an informal manner. Information pertaining to job priorities, work in process, and the status of backlog work in the various sections is communicated to the various levels of Division management primarily through personal communications. An up-to-date and comprehensive listing of work waiting to be performed and work in process should be helpful to management at all levels in carrying out their responsibilities.

ORGANIZATION

The Audit Team gave considerable attention to the Department's organization. It was found that the current organizational relationships do not provide the optimum coordination of activities and balance of workload. Further, the Department's 1979-80 organization chart does not reflect actual reporting relationships. The Accounting and Data Processing units are shown under the direction of the Deputy General Manager Airports-Administration I and II positions; however, those positions are both vacant, so the heads of the Accounting and Data Processing units instead report to the First Deputy General Manager Airports-Operations. To reduce the large number of activities under the supervision of the First Deputy General Manager-Operations and to correct other inconsistencies, it is recommended that the Department of Airports modify the organization as described below and as shown on the proposed organization chart on page 68. See Recommendation No. 30.

1. Eliminate the two vacant positions of Assistant General Manager Airports Administration I and II. Department management has expressed the opinion that there is currently no need to fill them.
2. Create an administrative support group headed by a new position (Director of Administration) and composed of the existing Property Management, Personnel Management, Accounting and Data Processing units, and a proposed new unit entitled Management Services (described below). Property management is recommended for inclusion in the administrative support group because it is primarily a business activity as opposed to planning or engineering. The regrouping of the other administrative activities will consolidate these activities and personnel, making more efficient use of staff time by balancing workload and relieving the First Deputy General Manager-Operations of the need to directly supervise so many persons.
3. Create a new unit, entitled Management Services, which would be a consolidation of administrative positions now reporting directly to the First Deputy General Manager-Operations and the Second Deputy General Manager-Planning and Engineering. The positions which would compose this new unit would include:
 - 1 Principal Administrative Assistant II
(now responsible for DOA insurance and risk management)
 - 3 Senior Administrative Assistant II

(now responsible for coordinating the airport parking program and liaison with the parking contractor(s), affirmative action coordination, and various special projects)

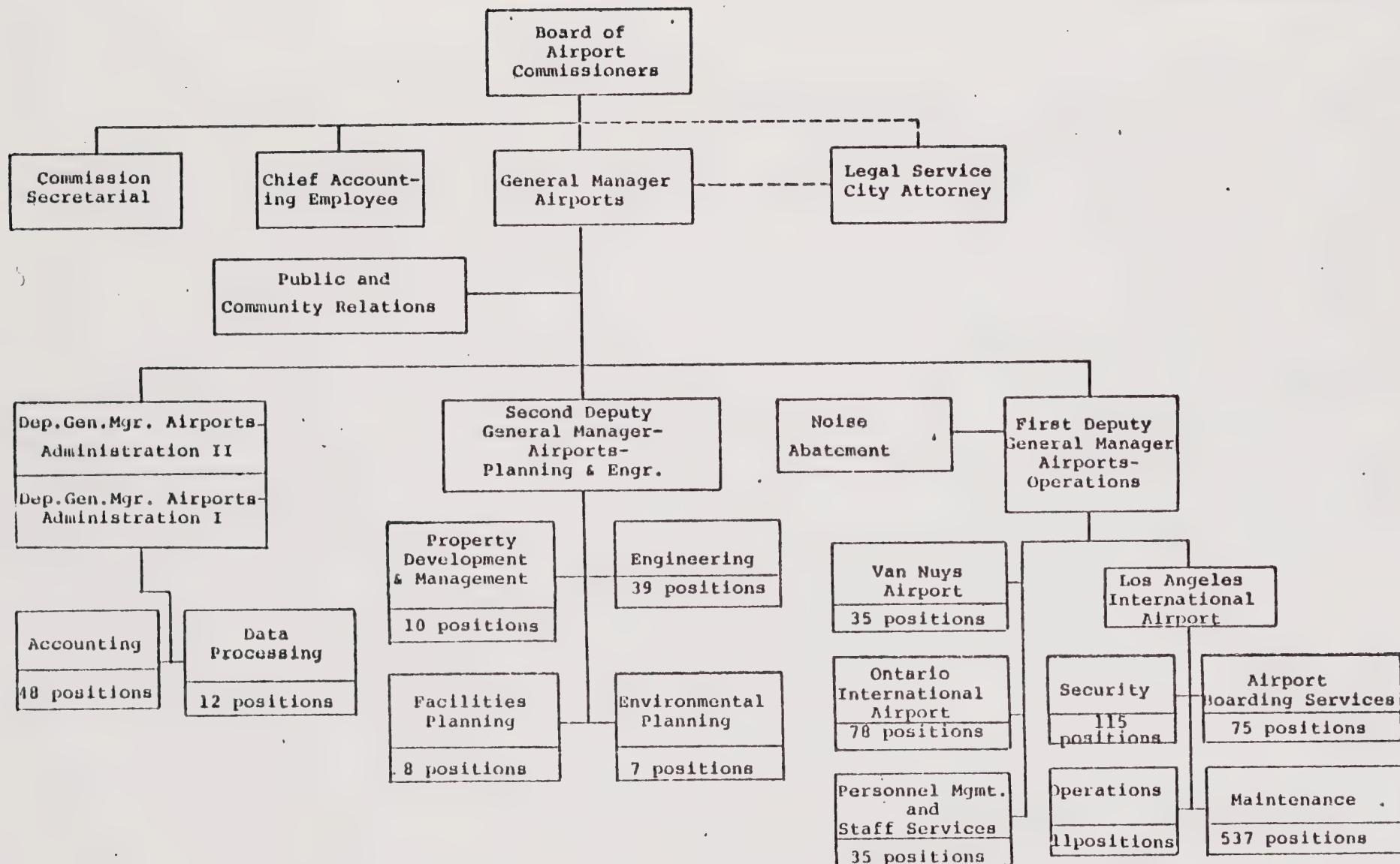
1 Airport Aide

2 Student Professional Worker

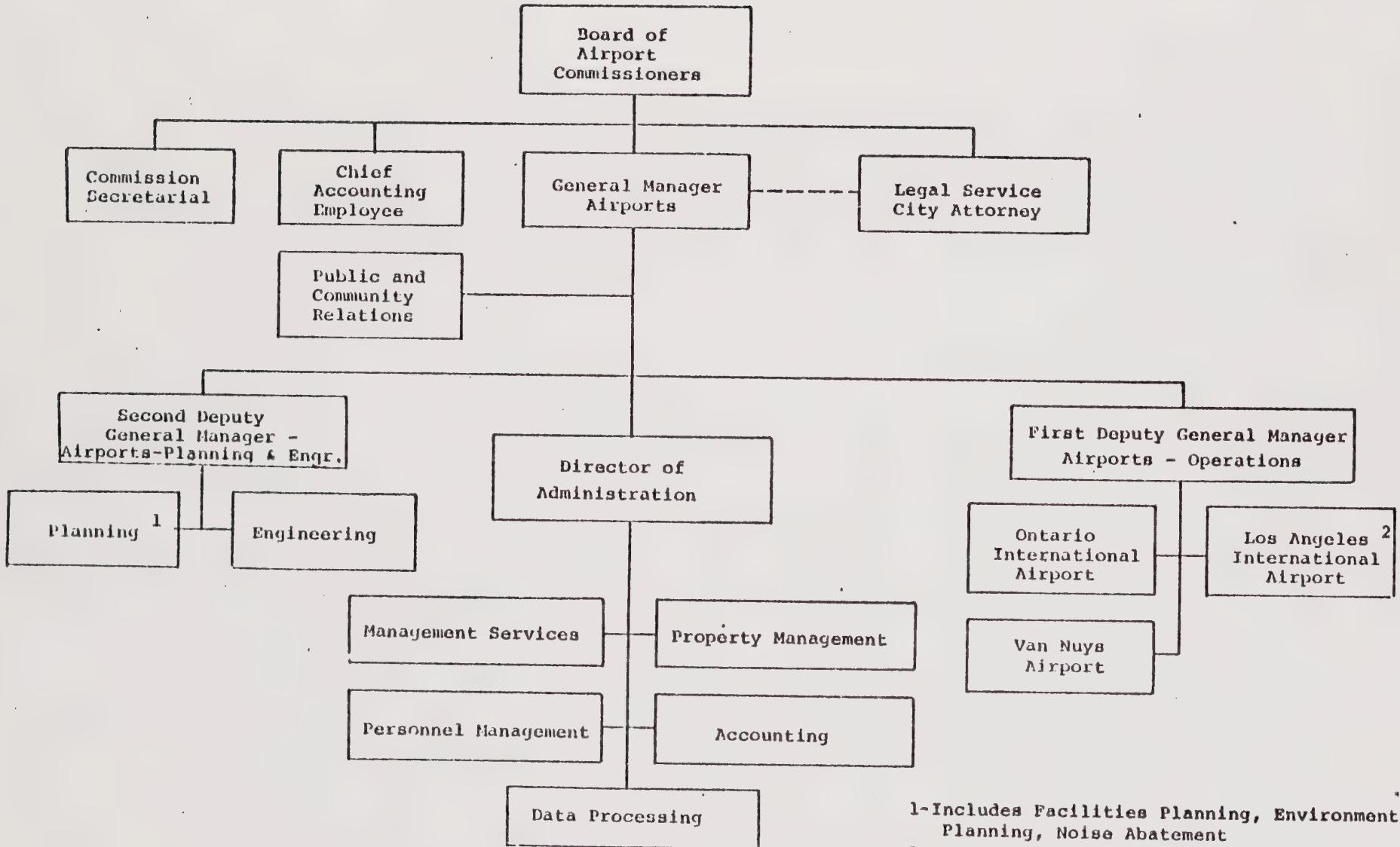
The head of the unit could be the Principal Administrative Assistant II. The Administrative Assistant Airports responsible for legislative liaison would continue to report to the First Deputy and provide general assistance to him.

4. Eliminate one of the two positions of Airports Public and Community Relations Director. One of these positions has always been vacant, and there appears to be no need for two positions to head up the Public and Community Relations Bureau.
- The Department should review other situations where there are two positions in a line relationship heading up an organizational unit. It may well be possible to eliminate additional positions as a result.
5. Continue the Second Deputy General Manager in the role of supervising the Planning and Engineering functions. It is probable that the accelerated capital improvement program during the next few years will occupy the vast majority of his time.
6. Place the Noise Abatement unit now reporting to the First Deputy in the Planning Unit. The Noise Abatement personnel are doing some planning work now, and the monitoring of noise by them is not of immediate operational concern. See Recommendation No. 30.

DEPARTMENT OF AIRPORTS
CURRENT ORGANIZATION



DEPARTMENT OF AIRPORTS
PROPOSED ORGANIZATION



1-Includes Facilities Planning, Environmental Planning, Noise Abatement

2-Includes Security, Airport Boarding Services, Operations and Maintenance

ENGINEERING DIVISION

The Engineering Division is responsible for the design and the construction management of engineering projects on airport property. Most of the Division's work relates to new construction or improvements at LAX, but an increasing number of projects involve other City airports. Civil Engineers perform most of the civil engineering design, except for very large projects or those requiring mechanical and electrical installations which are designed by consultant engineers. Construction of large projects is by private contract, but some of the smaller sized projects are constructed by the DOA Maintenance Division--with plans furnished by Engineering.

The engineering work relating to the design and construction of projects for the various airports is handled by four Design and Construction Project Teams. Tasks performed by each project team include:

- a. Designing and managing the construction of structure, runway, taxiway, road and utility projects.
- b. Reviewing and approving construction plans prepared by consultants.
- c. Managing the construction of consultant design projects.
- d. Providing design guidance for tenants.
- e. Reviewing and approving all tenant construction plans in ticketing and satellite buildings for one or more terminal areas at LAX.

In addition to the above, each of the project teams also has responsibility for specialized engineering assignments on a continuing basis. A partial list of these assignments includes: Remote parking lot projects, traffic and signal design, Imperial Highway leaseholds, northside expansion and development, West Imperial Terminal, pavement management program, and waste water and drainage projects.

The Programs and Special Services Unit, staffed with engineering personnel, prepares reports and performs other specialized tasks for the Division. The Unit conducts research and analyses, conducts special studies, and has numerous other ongoing engineering responsibilities in support of Division activities.

Other engineering support units include a Survey Unit, an Inspection Unit, and a Drafting and Blueprint Services Unit. The Survey and the Inspection Units are purposely kept small to avoid overstaffing during slack periods. Only limited survey and inspection work is performed at the various airports by Division personnel. When there are major projects or when increases in the normal workload occur, additional survey work is performed by the Department of Public Works Bureau of Engineering, and additional inspection work is handled by the Bureau of Contract Administration or the Department of Building and Safety.

Under the provisions of their leases, tenants may make certain improvements in their leasehold areas if approval of the changes is obtained from the Department. The plans and construction relating to this work may be performed by tenant employees or by contract. Project approvals must also be obtained from the Department when tenants desire to install new signs or to modify existing signs at City airports. Departmental approvals of tenant project plans are time consuming, and tenant representatives have complained about the delays.

Five Department offices must currently approve all tenant project plans. Approvals must be obtained from the following five Department offices: Engineering Division, Property Division, Environmental Division, Legal Section, and Office of the Second Deputy General Manager.

A few years ago, the tenant construction project approval procedure did not include necessity for approval by the Property, Legal, and Environmental units in the Department. Consequently, at that time, the approvals were handled much more rapidly. Department personnel have stated that the current time to complete all of the above steps is about three or four weeks. According to information obtained from an airlines representative, however, it was stated that it was their experience that the normal review and approval time, even for minor improvements, was from six to eight weeks, and that one specific project involving a proposal to change a directional sign was delayed nearly eight months by the Department.

Tenant approvals are currently processed in the sequential order indicated above, and each tenant request—even the minor requests, require review and approval by all of the Department units listed. Delays occur because of the routing time between offices, the backlog time in each office, and the actual review time required by representatives of each Department unit involved.

In order to better serve the airlines and other companies operating on airport property, action should be taken to streamline the processing of tenant project approvals.

Improvements should be possible by eliminating unnecessary review steps for simple requests, and by greater delegation of authority in the review process. See Recommendation No. 31.

RECORDS MANAGEMENT PROGRAM

The Department has long recognized the need for a records management program. A staff committee was appointed in 1971 to analyze the problem and submit recommendations. It found that there was unnecessary duplication of records, that valuable high-cost storage space was being used on a non-systematic basis for records retention, and that each organizational unit maintains its own records. The committee, after consultation with the City Records Management Officer, recommended that a records retention program be prepared in writing, that a records inventory be undertaken, that a records control officer be designated, and that suitable space be made available for the centralized location of all Department records. These recommendations were not implemented, and the same problems existed at the time of this audit that were found by the committee in 1971.

In November 1977, the General Manager requested the City Clerk to provide assistance in formulating and implementing a records management program for the Department of Airports, and said "We believe a program similar to those for other City Departments is in the best interests of both the City and this Department. Uniform establishment of records inventory procedures, retention schedules, destruction procedures and records storage and retrieval processes will facilitate such a program." In response, the City Records Management Officer has met with Department staff to discuss what will need to be done to establish such a program.

Section 12.6 of the Los Angeles City Administrative Code, which relates to the City Records Retention Program, states:

The provisions of this article shall apply to all officers and City Departments whose finances are provided for in the general City Budget. It is the policy of the City Council that those departments excepted shall comply with the provisions of this article whenever practicable and economical.

It therefore appears that it has been the policy of the City Council that the Department of Airports would comply unless there was a determination that it would not be practicable or economical to do so. The Audit Team is unaware of such a determination having been made. See Recommendation No. 33.

In addition to the records retention program, there is a need for correspondence control and forms control programs.

Establishing a central filing place for Department records and a reference library should also be considered by the Department.

Correspondence control is presently decentralized and performed in various offices. It would appear desirable to have one central place where correspondence coming to the Department is reviewed, routed and recorded where appropriate. Correspondence requiring action should in some cases be given a due date and be sent out through the control desk when completed. This system could also be used to control assignments generated by the Department.

There is no forms control program in the Department. City general forms are being used, but Bureaus are also permitted to develop their own forms without central approval based on established standards.

At one time there was an active General File for the entire Department maintained by the Bureau of Personnel. This has fallen into disuse, and most bureaus neither contribute to nor utilize the General File. The need for a properly maintained central file that will avoid duplication and permit faster location of records should be evaluated.

Although there is now an area referred to as the Central Information Files, this amounts to a collection of reference materials such as reports and budgets and it is not a central file of correspondence and documents. See Recommendation No. 32.

AFFIRMATIVE ACTION

The Department of Airports is making a good effort to improve employment opportunities for women and minorities. The Commission and staff are to be commended for their interest and willingness to consider non-traditional approaches.

An in-depth study of the Department's Affirmative Action Program was performed by the City Personnel Department in 1977. Specific recommendations were made to improve representation in each occupational category and to improve a number of aspects of the Department's program. The Department has subsequently implemented or has indicated it will implement most of these recommendations, and appears to be in technical compliance with the City plan.

APPENDICES

- A. Legal Authority
- B. Excerpts from Prior Studies Regarding Regional Airport Authority

LEGAL AUTHORITY

The Department of Airports is under the management and control of the Board of Airport Commissioners in accordance with Section 238 of the City Charter. The Charter specifically provides that the Board shall:

1. Have possession management and control of all airports, airport sites, and all equipment, accommodations and facilities for aerial navigation, flight, instruction and commerce belonging to or pertaining to the City.
2. Fix, regulate and collect rates or charges for the use of all buildings, grounds, and facilities which are owned, controlled or operated by the City for air commerce and air navigation and for services in connection therewith.
3. Regulate and control all concessions, public service and public utilities operated at any airport under its control, and fix the charges to be made to the public and the fees to be paid to the City.
4. Have the power to purchase, lease, acquire, design, erect, maintain, improve, repair and operate all such property, improvements, utilities, equipment, supplies, machinery, aircraft, watercraft, vehicles or facilities as it deems necessary for air commerce and navigation, or for manufacture or repair of devices therefor.
5. Have the power to grant franchises, permits and licenses to, and to enter into leases with persons or governmental agencies for the use of airport land and facilities for air commerce or navigation; or if the Board determines that certain property is not necessary for air commerce and air navigation it may lease that property for other purposes.

All franchises, permits, licenses and leases granted or entered into for a definite period of time must be made by Board order and if made for a period of five years or less must be published in the same manner as ordinances of the City and take effect upon publication. If for longer than five

years, they must be submitted to the Council for its approval or disapproval.

6. Have the power and duty to make and enforce all necessary rules and regulations governing the use and control of all municipal airports in the City, or upon its property wherever located, and the use of airways and waterways incident to aerial navigation.

(These regulations must be approved by the Council by ordinance).

7. Have power to order and contract for the expenditure of all money derived from the sale of bonds of the City issued for airport improvements, and of all money in the airport revenue fund.
8. Have power to appoint and remove a general manager for the Department, which position is exempt from Civil Service provisions of the Charter.
9. Prior to the beginning of each fiscal year, adopt an annual departmental budget and make an annual department budget appropriation, covering the anticipated revenues and expenditures.
10. Provide suitable quarters, equipment and supplies for the Department, and create the necessary positions.

The Charter also provides that the General Manager of the Department shall:

1. Enforce all orders, rules and regulations adopted by the Board relating to the regulation, operation or control of the funds, facilities, properties and apparatus of the Department.
2. Supervise and manage the design, construction, maintenance and operation of all work or works authorized by the Board.
3. Have the power to designate and assign space for the use of aircraft, in writing, on a revocable basis.

Section 239.8 establishes the Airport Revenue Fund. The Board of Airport Commissioners has control over this Fund and authority to make appropriations, transfers, or expenditures, only for purposes pertaining to the financing and maintenance and

operation of City owned, operated or controlled airports and related facilities.

Section 240 provides the power to borrow money, issue revenue bonds and refund indebtedness. Bonds issued by the Department pursuant to Section 240 are an indebtedness of the Department of Airports and not of the City of Los Angeles.

Section 240.1 specifies that at least once every five years the Board shall cause an industrial, economic and administrative survey to be made of the business and property of the Department by an independent qualified organization specializing in such surveys. These surveys are to be made to determine if the Department is operating in the most efficient and economical manner. The Mayor and Council must approve the organization employed to make the surveys and may order the Board to cause such a survey more often than every five years if they deem it necessary.

The Los Angeles Municipal Code contains various sections relating to airports and aircraft operations:

12.19 A and 12.24 B1(a) - Zoning for Landing Fields

12.50 - Airport Approach Zoning Regulations

42.11.1, 56.30 - Loitering Prohibited at Airports

57.101..01 to 57.102.05; 57.32.60 to 57.32.75, 57.100.22
- Fire Regulations at Airports, Aircraft Factories, Hangars, and Aircraft Fueling Stations.

63.101 - Department of Airports exempt from provisions which require the assignment of shop numbers by the Purchasing Agent.

89.00 to 89.50 - Traffic Regulations within the Los Angeles International and Van Nuys Airports.

91.1712 and 91.2307(e) - Heliports and Helistops

The Los Angeles Administrative Code also has a Chapter concerning the Department of Airports (Division 23, Chapter 1). Article 4 entitled "Rules and Regulations Governing the use of L.A. Airports" appears to duplicate material in the Municipal Code. (Discussion with a representative of the City Attorney indicates this Article should be reviewed and if possible consolidated into the Municipal Code.)

In addition to the City requirements listed above, the Department of Airports must also comply with various State and

Federal laws and regulations. These include, for example, the California Environmental Quality Act (CEQA), California Noise Standards, California Coastal Act, and Federal Aviation Administration Regulations.

EXCERPTS FROM SELECTED STUDIES REGARDING REGIONAL AIRPORT AUTHORITY

1. A Stanford Research Institute report titled, "Southern California Regional Airport Study", March, 1964, emphasized:

The single, overriding conclusion of the study is that the primary need is to plan and administer airports in Southern California as a system. Only in that way can the region expect to achieve fully effective and economic utilization of its existing facilities. Because of the projected rate of growth in aviation activity and the cost and difficulty of developing new airports, this appears to be the only practical way to assure that future aviation growth in Southern California will be accommodated.

2. In 1969, the McKinsey and Company, Inc., released a report on Department of Airports operations. One of the four major recommendations in the report was that the Department exercise leadership in promoting creation of a regional airport operating authority. The report contained significant findings supporting such an authority:

Air transportation in Southern California is rapidly growing beyond the size and complexity where either a single city government or the voluntary efforts of many governments are likely to be effective in meeting the needs of the overall region.

Air transportation has grown significantly in the last decade and is expected to continue growing at a rapid pace during the next decade. Provision of air transportation facilities was once of primary concern only to major cities. However, continued expansion of airways, physical growth of cities, and changing aircraft technology are creating transportation system needs that a single city cannot fulfill.

The Department of Airports has also recognized the importance of basing future facilities planning on regional needs. However, it is not authorized to plan or implement on a broad regional basis. Even so, in discharging its responsibility to the City of Los Angeles to promote air transportation and

commerce, DOA is planning facilities, such as those in Palmdale, which will help in meeting future needs for the entire Southern California region.

Other governments in Southern California also have recognized the regional nature of air transportation problems and have begun working to understand and solve them. The Southern California Association of Governments (SCAG), which represents many of the governmental agencies in Southern California, is preparing to launch a study to identify and plan for future regional air transportation needs. SCAG hopes to achieve voluntary, cooperative implementation of regional plans once they are developed.

We are concerned that such voluntary implementation will be difficult, if not impossible, to achieve and believe that a regional operating authority is likely to be essential in accomplishing integrated implementation. Consequently, we believe that DOA should continue to support the SCAG study, but should go one step beyond. Therefore, we recommend that DOA adopt a policy of supporting the creation of a regional airport operating authority that is empowered to act throughout the region on a timely basis to meet future facilities needs.

3. The 1972 SCRASS (Southern California Regional Aviation System Study) prepared as a joint venture between William Pereira Associates and System Development Corporation, for the Southern California Association of Governments (SCAG), recommended the creation of a regional authority. The following are excerpts from this study:

"Effective regional coordination is mandatory and various administrative structures to provide it must be considered."

"...a regional aviation system is essential here to transcend political boundaries, in the air, and on the ground. The proposed regional aviation systems plan is urgently needed to guide the future of air transportation throughout Southern California, now and in the future."

"Implementation is vital to any plan...an hierarchical administrative system is proposed to implement the components and develop the full spectrum of facilities..." and

"...conflicts are greatest between those demanding service on one hand and restraint on the other. It is clear that these conflicts require resolution above the local level...the ultimate solution to most of the fundamental problems, and realization of the maximum overall public benefit, will require creation of a regional agency to integrate public air service with other modes of transportation at the regional level."

4. A 1975 Peat, Marwick, Mitchell & Company study of the Airports Department also referred to the need for a regional airport authority, and recommended that "The Department should consider the possibility of promoting a regional council of airports sponsors to be comprised of all jurisdictions in the region which own and operate public airport facilities."

The Study also stated, "The regional council could afford the opportunity for dialogue and lay the foundation for substantial improvements in the efficiency of the operation of the region's airport system without requiring individual communities to relinquish direct control of existing airport facilities."

EXHIBITS

- I. Airport Profiles - City of Los Angeles
- II. Department of Airports' Financial Statement
- III. Department of Airports' Operating Statement
- IV. Landing Fees at Major Hub Airports

AIRPORT: LOS ANGELES INTERNATIONAL (LAX)
TYPE: Major Airline Airport

LOCATION: Southwest section of Los Angeles at west end of Century Boulevard, 13 miles from the Civic Center.

TOTAL ACRES: 3585 **PROPOSED ACREAGE:** 3585

REGULARLY SCHEDULED AIRLINES: 42 (Includes 3 commuter airlines)

CHARTER AIRLINES: 12

NUMBER OF TAKEOFFS AND LANDINGS:

500,976 in 1977

(Air Carrier - 360,516, Air Taxi - 71,295,
Military - 3,550, General Aviation - 65,615)

NUMBER OF PASSENGERS SERVED:

28.4 million in 1977

PROJECTED MAXIMUM PASSENGER VOLUME:

40 million annual passengers

NUMBER OF PUBLIC PARKING SPACES:

Approximately 20,000

NUMBER OF TENANTS (INCL. AIRLINES): 173

MAJOR PLANNED CAPITAL IMPROVEMENTS:

<u>TITLE</u>	<u>YEAR TO BE COMPLETED</u>
Terminal 1	1982
Intra-Airport Transportation System	1984
World Way Tunnel & Connection to Manchester	1984
World Way Tunnel & Connection to Imperial	1983
North Acquisition Area Development	1983

AIRPORT: ONTARIO INTERNATIONAL AIRPORT (ONT)

TYPE: Major Airline Airport

LOCATION: Pomona Valley, 35 miles east of Downtown, Los Angeles, between San Bernardino and Pomona Freeways

TOTAL ACRES: 1142

PROPOSED ACREAGE: 1142

REGULARLY SCHEDULED AIRLINES: 9

(Major airlines certified to serve Los Angeles International Airport may without further permission from the CAB, initiate service from Ontario on most of their authorized routes.)

CHARTER AIRLINES: None

NUMBER OF TAKEOFFS AND LANDINGS:

162,530 in 1977
 (Air Carrier - 31,136, General Aviation - 102,935)
 Alternate Operations - 226, Air Taxi - 16,056,
 Military - 12,177)

NUMBER OF PASSENGERS SERVED:

1.7 million in 1977

PROJECTED MAXIMUM PASSENGER VOLUME:

12-15 million annual passengers by 1990's

NUMBER OF PUBLIC PARKING SPACES:

2,284

NUMBER OF TENANTS (INCLUDING AIRLINES): 80

MAJOR PLANNED CAPITAL IMPROVEMENTS:

<u>TITLE</u>	<u>YEAR TO BE COMPLETED</u>
Passenger Terminal Phase 1	1981
Passenger Terminal Phase 2	1983
Runway 25L & Connecting Taxiways	1979
Runway 25R Extension & Strengthening	1980

AIRPORT: VAN NUYS

TYPE: General Aviation Airport

LOCATION: West Van Nuys section of the San Fernando Valley,
approximately 20 miles from downtown Los Angeles

TOTAL ACRES: 726

PROPOSED ACREAGE: 726

REGULARLY SCHEDULED AIRLINES: None

CHARTER AIRLINES: None

NUMBER OF TAKEOFFS AND LANDINGS:

592,863 in 1977
(General Aviation - 589,135, military - 3,571,
Air Taxi - 157)

NUMBER OF PASSENGERS SERVED ANNUALLY:

Not Applicable -

PROJECTED MAXIMUM PASSENGER VOLUME:

Not Applicable

NUMBER OF PUBLIC PARKING SPACES:

Limited parking for aircraft owners and tenants
(Separate parking lot for persons taking buses to LAX)

NUMBER OF TENANTS (INCLUDING AIRLINES): 76

MAJOR PLANNED CAPITAL IMPROVEMENTS:

<u>TITLE</u>	<u>YEAR TO BE COMPLETED</u>
Runway Strengthening & Taxiway Reconstruct	1980

AIRPORT: PROPOSED PALMDALE INTERCONTINENTAL AIRPORT (PMD)

TYPE: Future Major Airline Airport

LOCATION: Antelope Valley, northeast of City of Palmdale and adjacent to 6000 acre U.S. Air Force Plant 42.

TOTAL ACRES: 17,150 PROPOSED ACREAGE: 17,745

REGULARLY SCHEDULED AIRLINES: 1 (Commuter Service Only)

CHARTER AIRLINES: None

NUMBER OF TAKEOFFS AND LANDINGS: 2,644 in 1977

NUMBER OF PASSENGERS SERVED ANNUALLY: 6,147

PROJECTED MAXIMUM PASSENGER VOLUME:

12 million annual passengers by 1995

NUMBER OF PUBLIC PARKING SPACES: 250

NUMBER OF TENANTS (INCLUDING AIRLINES): 1

MAJOR PLANNED CAPITAL IMPROVEMENTS:

<u>TITLE</u>	<u>YEAR TO BE COMPLETED</u>
Preliminary Site Improvements	1984

DEPARTMENT OF AIRPORTS
Fiscal Year Ended June 30, 1978
Statement of Source and Use of Funds
(\$ Millions)

Funds generated internally from operations

Revenues

Landing fees	\$14.1
Landing fees carried over from FYE 1977	<u>1.3</u>
Total airfield revenue	<u>\$ 15.4</u>
Concession, rental, parking and other	\$48.5
Interest and other	<u>3.3</u>
Total non-airfield revenues	<u>51.8</u>
Total revenues	<u>\$ 67.20</u>
Less Operating Expenses and Adjustments	<u>37.01</u>
Predetermined or Required net income, before depreciation, amortization and interest	<u>\$ 30.19</u>
Payment of principal and interest	
Principal	\$ 9.87
Interest-maximum due in future year (Note 1)	<u>14.24</u>
Total principal and interest	<u>24.11</u>
<u>Total funds generated internally from operations</u>	<u>\$ 6.08</u>
<u>Funds generated from external sources</u>	
Interest on construction funds	\$ 2.04
Government grants	<u>3.43</u>
Rental income on acquisition properties	<u>.72</u>
Total	<u>6.19</u>
<u>Total funds generated</u>	<u>\$ 12.27</u>

Use of funds

Additions to properties	\$ 13.78
Payment to City	<u>1.00</u>
<u>Total use of funds</u>	<u>14.78</u>

Excess of funds used over funds generated

Cash received in current year, to be reported
as operating revenue in future years.

International Host Concession	\$ 16.37
Landing fees	<u>1.10</u>
Miscellaneous debits and credits - net (Note 1)	<u>.61</u>
Total	<u>\$ 18.08</u>

Increase in working capital per CPA report

NOTE 1 - Actual interest in current year exceeded maximum due in future year by \$.32 million- shown as a Miscellaneous debit.

CITY OF LOS ANGELES
DEPARTMENT OF AIRPORTS
OPERATING STATEMENT
FOR THE FISCAL YEAR ENDED JUNE 30, 1978

SCHEDULE A-1

	<u>Los Angeles</u> <u>Int'l.</u> <u>Airport</u>	<u>Ontario</u> <u>Int'l.</u> <u>Airport</u>	<u>Van Nuys</u> <u>Airport</u>	<u>Agua Dulce</u> <u>Airport</u>	<u>Palmdale</u> <u>Int'l.</u> <u>Airport</u>	<u>Suburban</u> <u>Air Pass.</u> <u>Terminal</u>	<u>Total</u>
OPERATING REVENUE:							
Aviation Revenues	\$30,930,956	\$1,620,606	\$1,474,690	\$ 16,419	\$ 55,831	\$ -0-	\$ 34,098,502
Concession Revenues	26,775,641	1,625,763	44,164	-0-	225	396,180	29,341,972
Airport Sales & Serv.	362,749	30,441	18,618	23,013	-0-	-0-	434,821
Miscellaneous	<u>50,841</u>	<u>811</u>	<u>3,367</u>	<u>1,160</u>	<u>26</u>	<u>5</u>	<u>56,210</u>
	58,120,187	3,277,621	1,540,839	40,592	56,082	396,185	63,931,508
OPERATING EXPENSE:							
Maintenance & Repairs	17,871,680	969,479	1,264,582	3,433	81,563	106,055	20,296,792
Administrative Expense	7,208,611	1,113,973	348,223	2,077	970,022	1,001,570	10,644,476
General Operating Exp.	2,073,345	637,488	75,905	21,298	1,064,715	27,057	3,899,808
Cost of Sales & Serv.	<u>315,432</u>	<u>26,470</u>	<u>16,190</u>	<u>20,011</u>	<u>-0-</u>	<u>-0-</u>	<u>378,103</u>
	27,469,068	2,747,410	1,704,900	46,819	2,116,300	1,134,682	35,219,179
INCOME (LOSS) FROM OPERATIONS							
	30,651,119	530,211	(164,061)	(6,227)	(2,060,218)	(238,497)	28,712,327
NON-OPERATING REVENUE:							
Interest Income	4,738,644	199,444	53,601	-0-	291,955	34,192	5,327,836
Miscellaneous	<u>572</u>	<u>(3,257)</u>	<u>(123)</u>	<u>(320)</u>	<u>-0-</u>	<u>-0-</u>	<u>(3,123)</u>
	4,739,221	196,187	63,478	(320)	291,955	34,192	5,324,713
INCOME (LOSS) BEFORE OTHER DEDUCTIONS							
	35,390,340	723,398	(100,583)	(6,547)	(1,768,253)	(204,305)	34,037,040
OTHER DEDUCTIONS:							
Interest Expense	10,162,176	402,950	205,650	-0-	3,790,001	-0-	14,560,777
Depreciation	4,146,099	310,555	382,070	32	62,359	19,214	4,920,329
Depreciation Grants & Other Aid	<u>393,964</u>	<u>18,766</u>	<u>44,035</u>	<u>-0-</u>	<u>-0-</u>	<u>-0-</u>	<u>456,755</u>
	14,702,239	732,271	651,755	32	3,852,360	19,214	19,937,371
NET INCOME OR (LOSS) FOR THE YEAR							
	\$20,583,101	\$ (5,373)	\$ (732,378)	\$ (5,579)	\$ (5,520,621)	\$ (223,579)	\$ 14,099,169
DISTRIBUTION OF RESTRICTED FUNDS:							
Reduction of Bond Principal					\$ (10,771,000)		
Repayment of Contributions - City of Los Angeles (Note 7)					(1,000,000)		
Restricted Income from Bond Funds					(2,869,522)		
							14,640,522
BALANCE AVAILABLE FOR CAPITAL IMPROVEMENTS							
						\$ (541,753)	

LANDING FEES AT MAJOR HUB AIRPORTSLANDING FEES
PER 1000 LBSLAX

October 1, 1967	16.0¢
November 1, 1970	28.5¢
July 1, 1971	33.5¢
April 1, 1973	44.0¢
July 1, 1973	31.5¢
July 1, 1974	40.0¢
July 1, 1975	52.0¢
July 1, 1976	43.0¢
July 1, 1977	50.0¢
July 1, 1978	20.0¢
	16.0¢

OTHER AIRPORTS - APRIL 1977

Tampa	20 ¢
New Orleans	23 ¢
Las Vegas	28 ¢
Denver	28 ¢
National D.C.	30 ¢
Phoenix	31 ¢
Dallas	37 ¢
Minneapolis/St. Paul	37 ¢
Miami	38 ¢
Kansas City	38 ¢
Atlanta	44 ¢
Houston	44 1/2¢
San Francisco	46 ¢
J.F. Kennedy	50 ¢
Cleveland	59 ¢
Philadelphia	76 ¢
Chicago	86 ¢
Boston	87 ¢
Pittsburgh	90 ¢
Dallas/Fort Worth	93 ¢
Detroit	96 ¢
Seattle/Tacoma	\$1.40
LaGuardia	\$1.50

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